

FIG. 1A

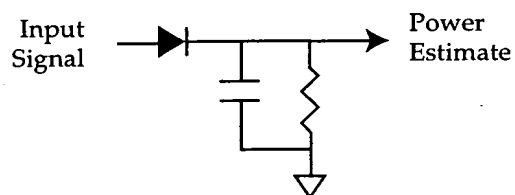


FIG. 1B

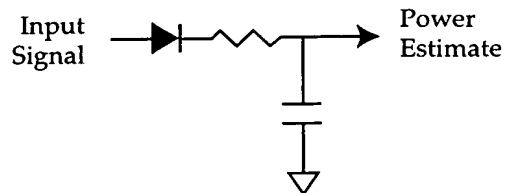


FIG. 1C

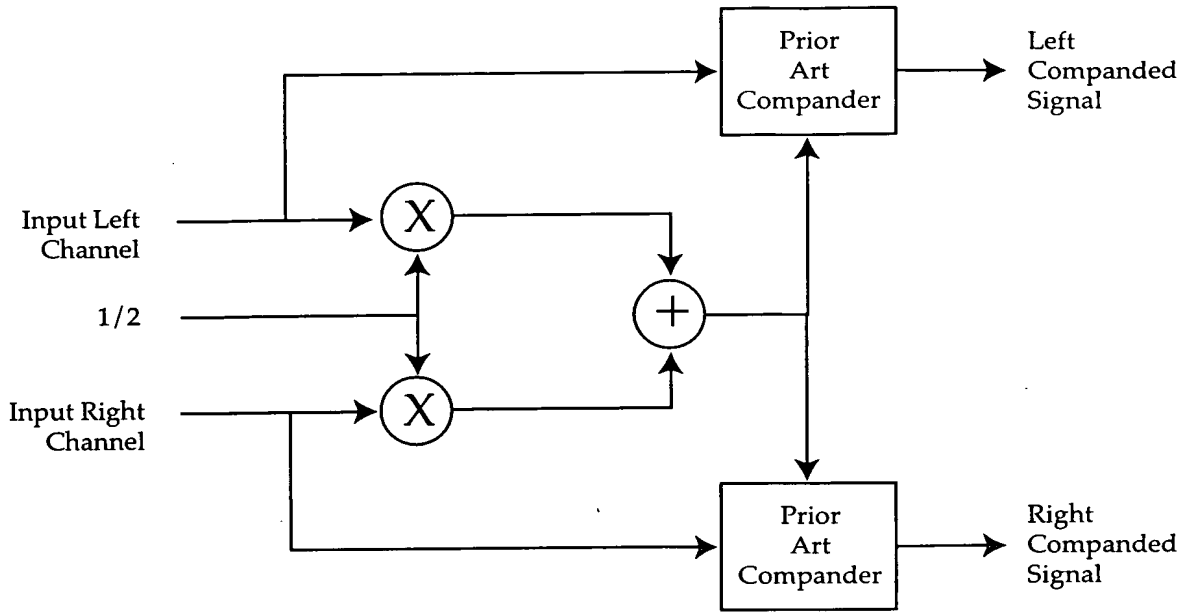


FIG. 1D

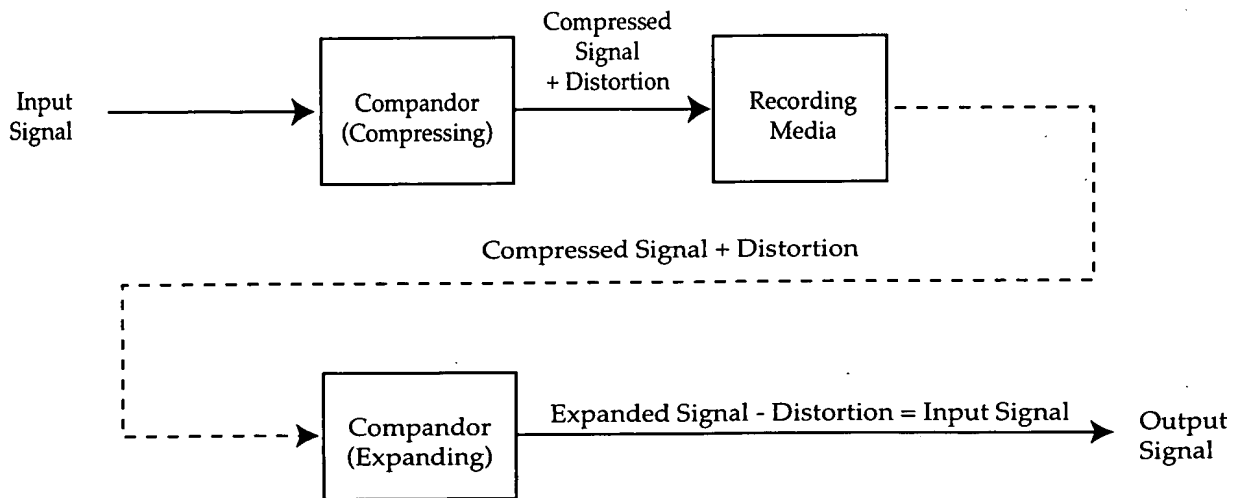


FIG. 1E

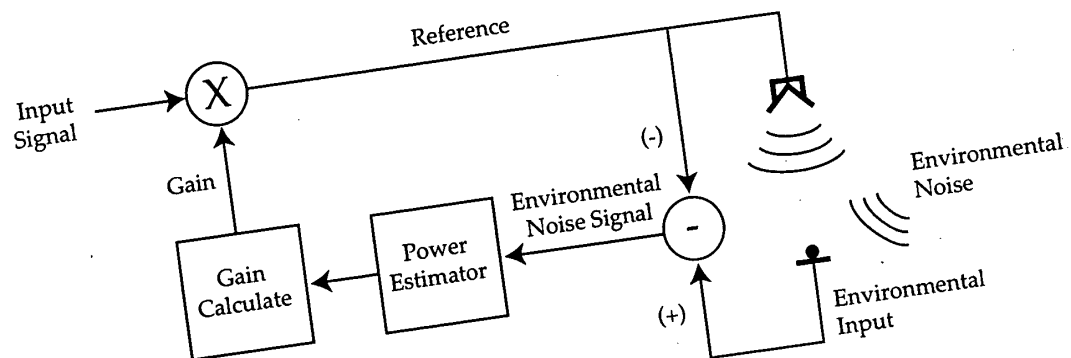


FIG. 2

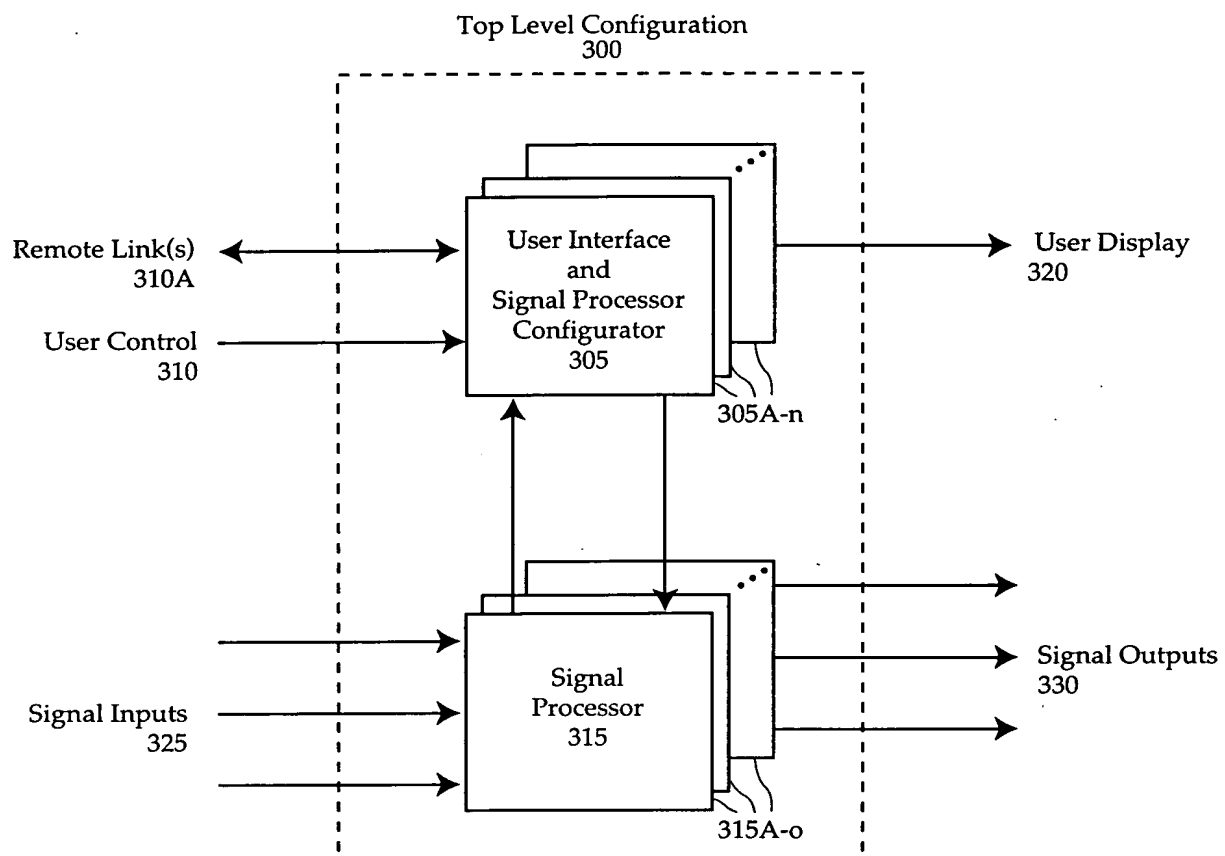


FIG. 3A

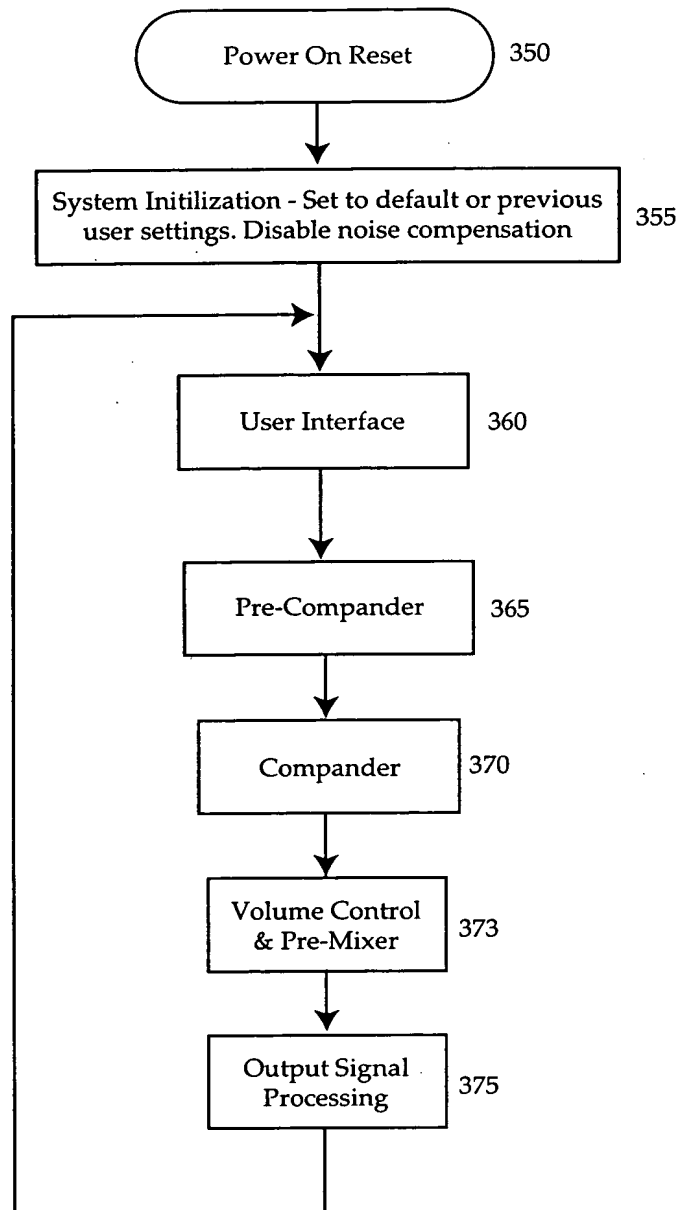


FIG. 3B

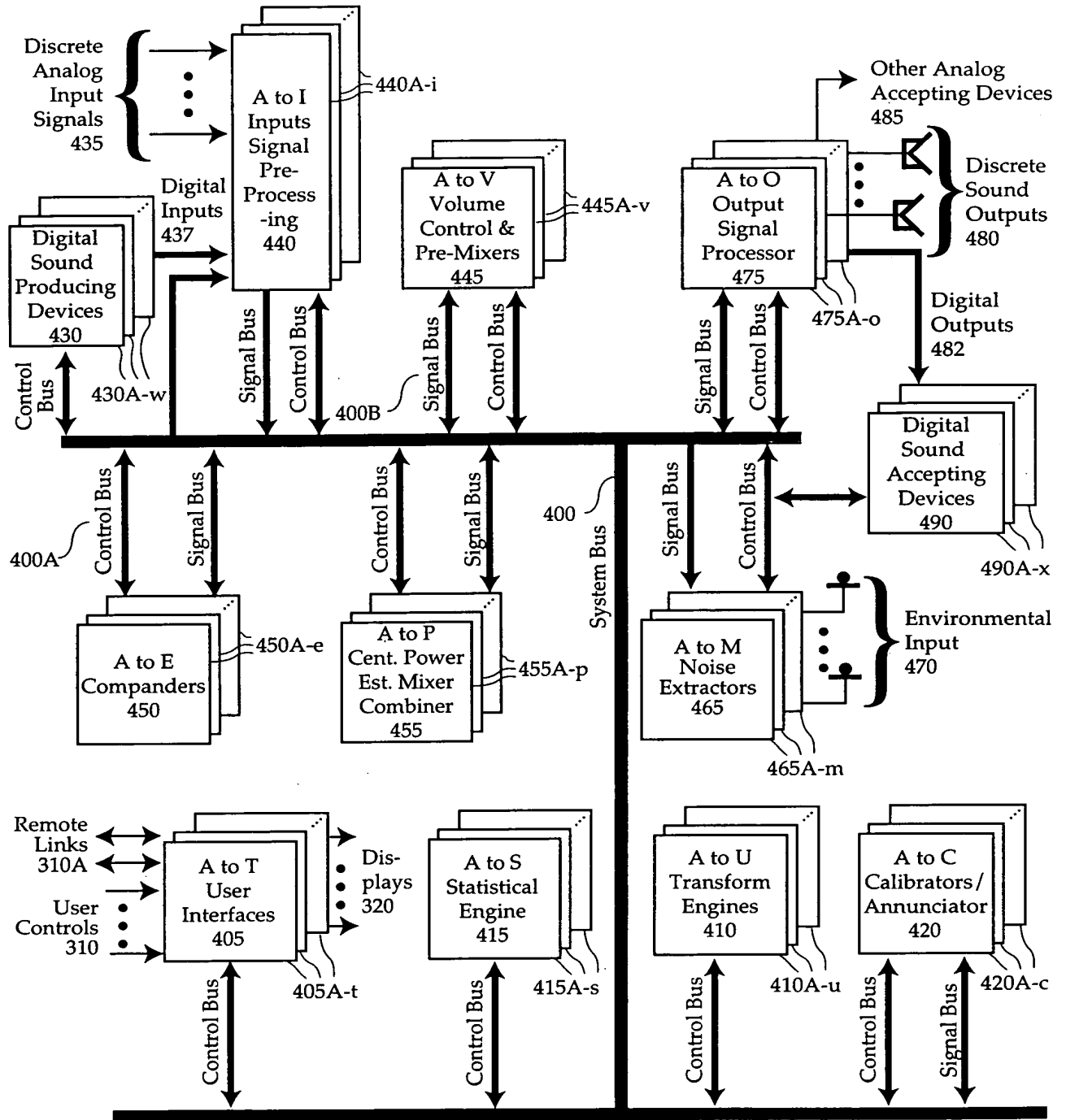


FIG. 4

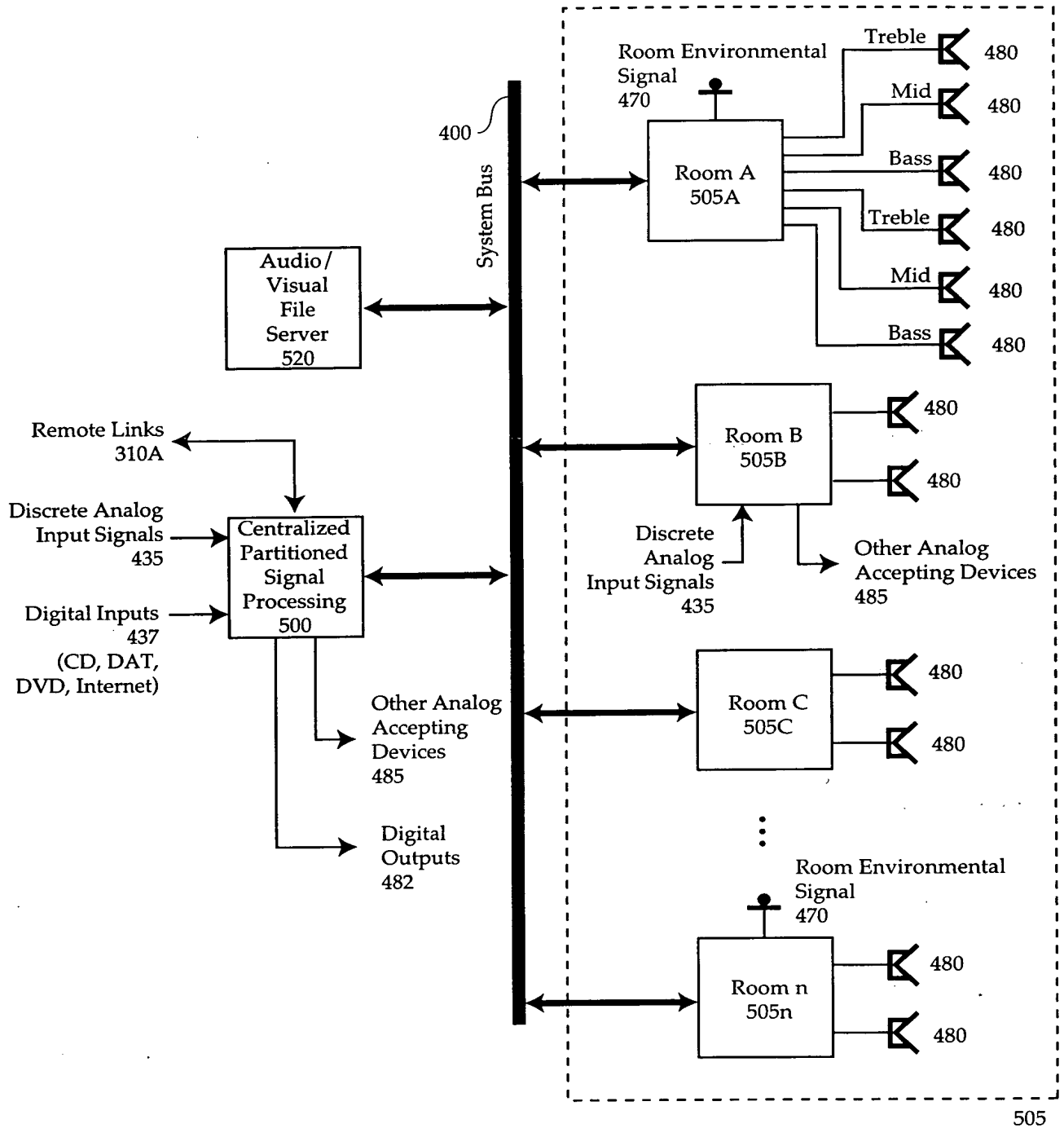
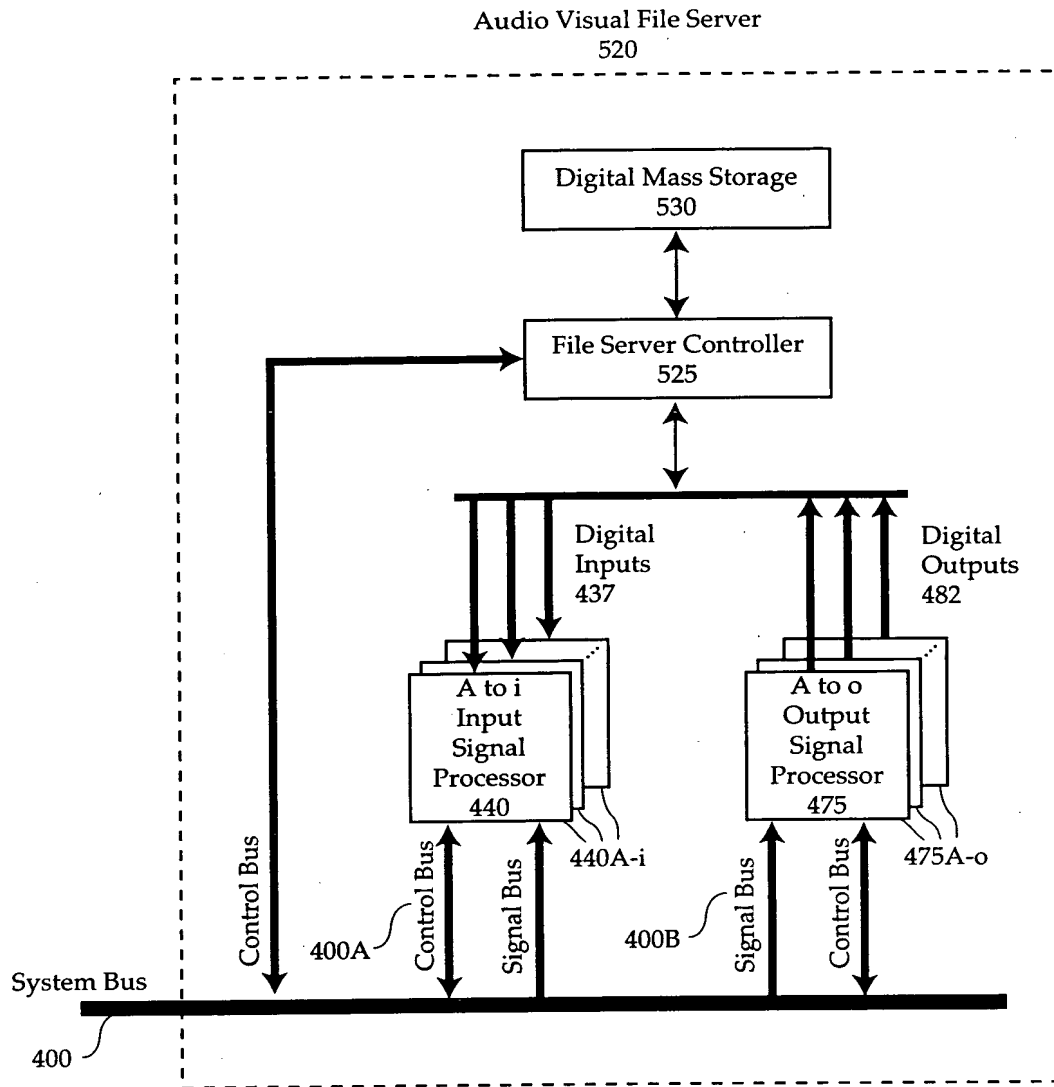


FIG. 5A



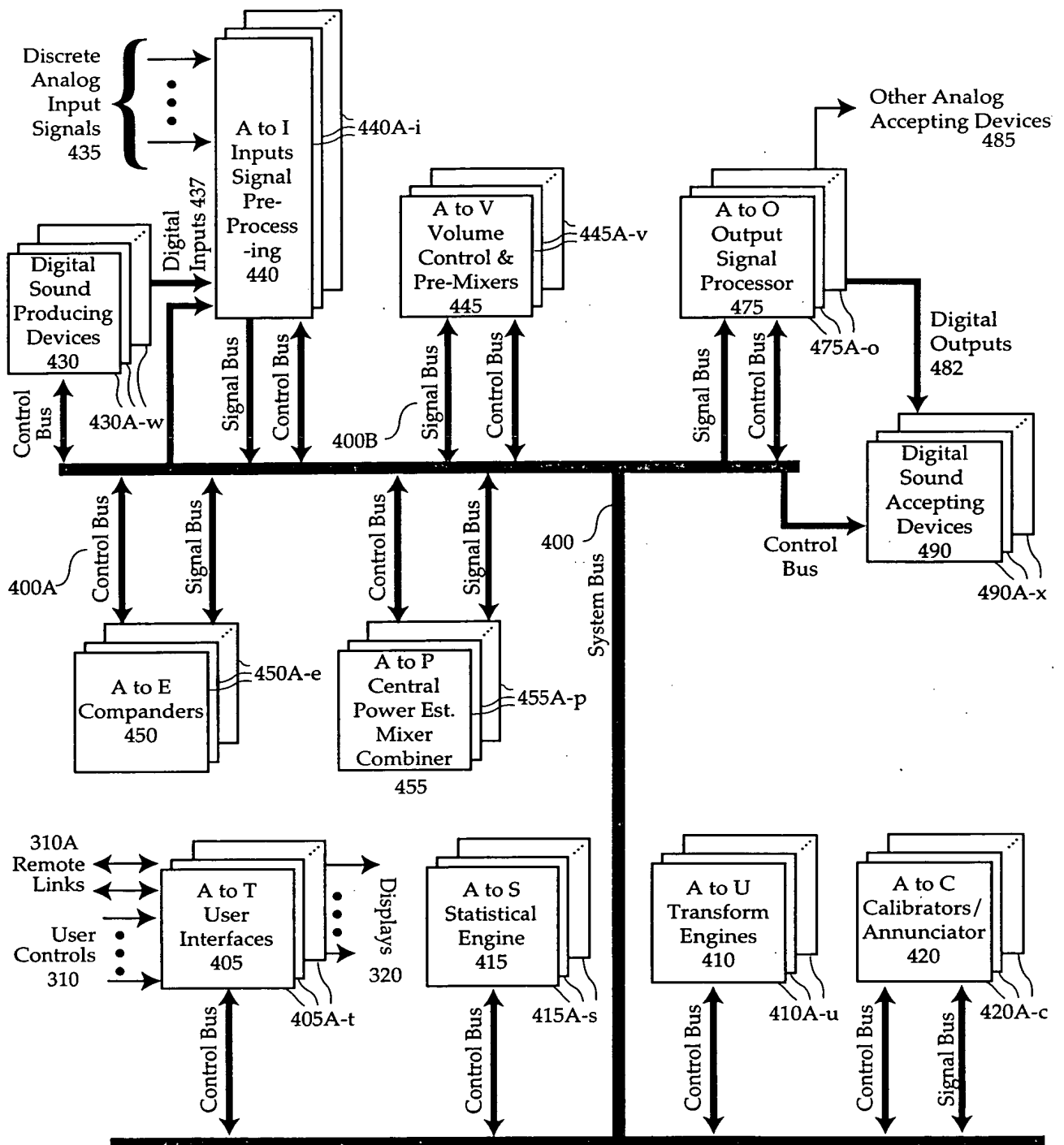


FIG. 5C

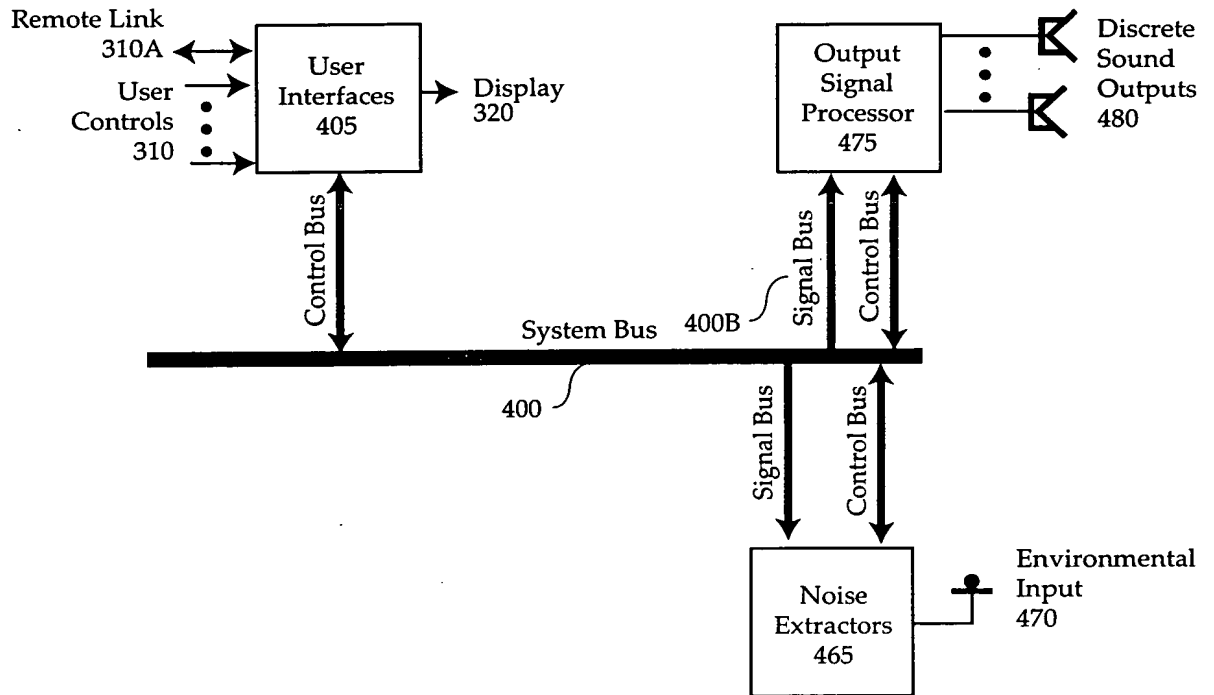


FIG. 5D

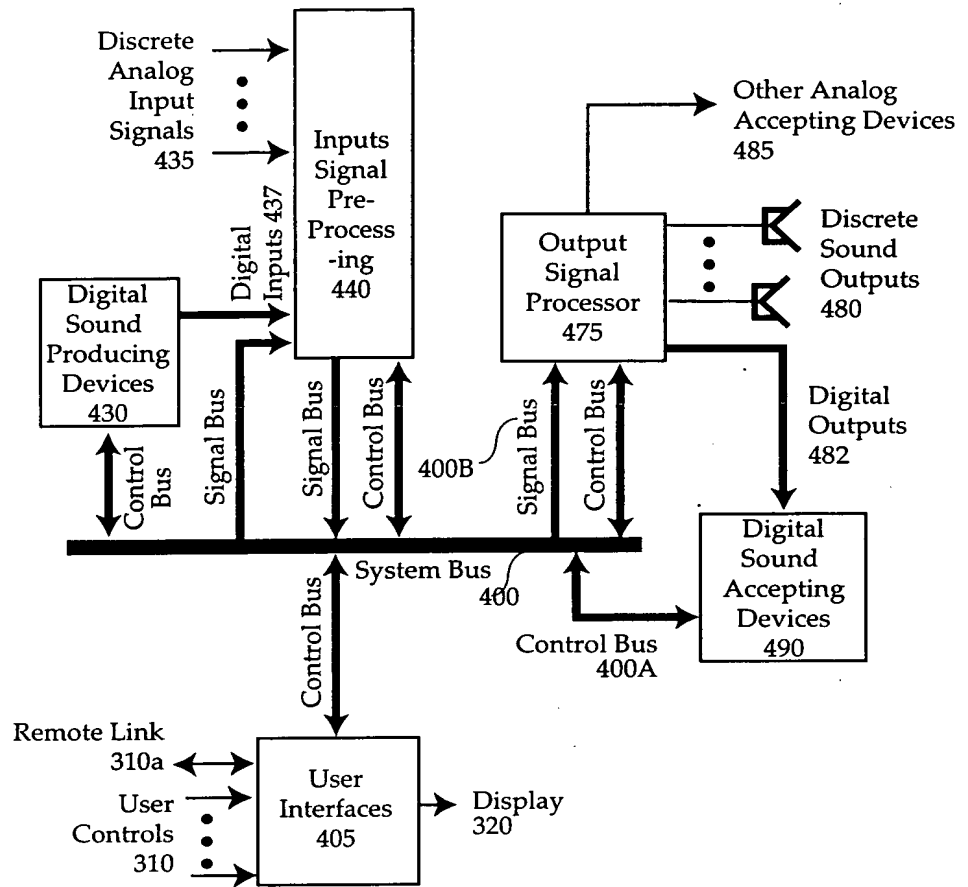


FIG. 5E

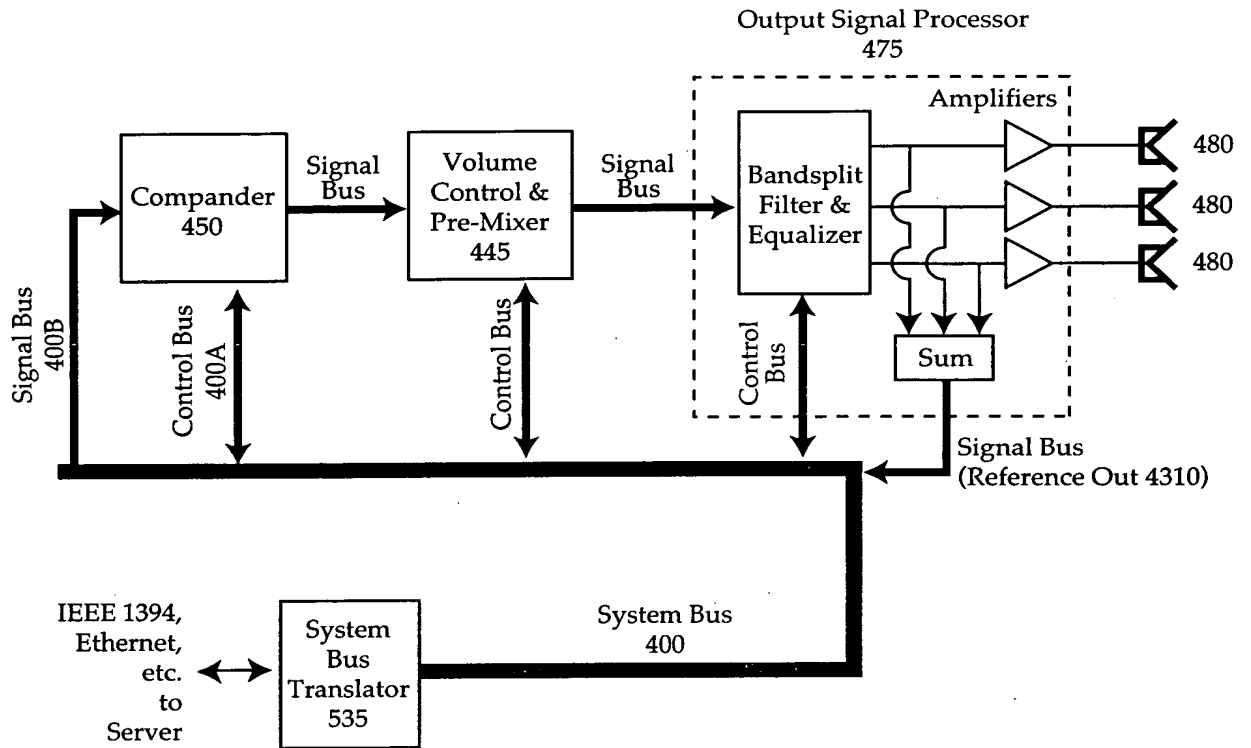


FIG. 5F

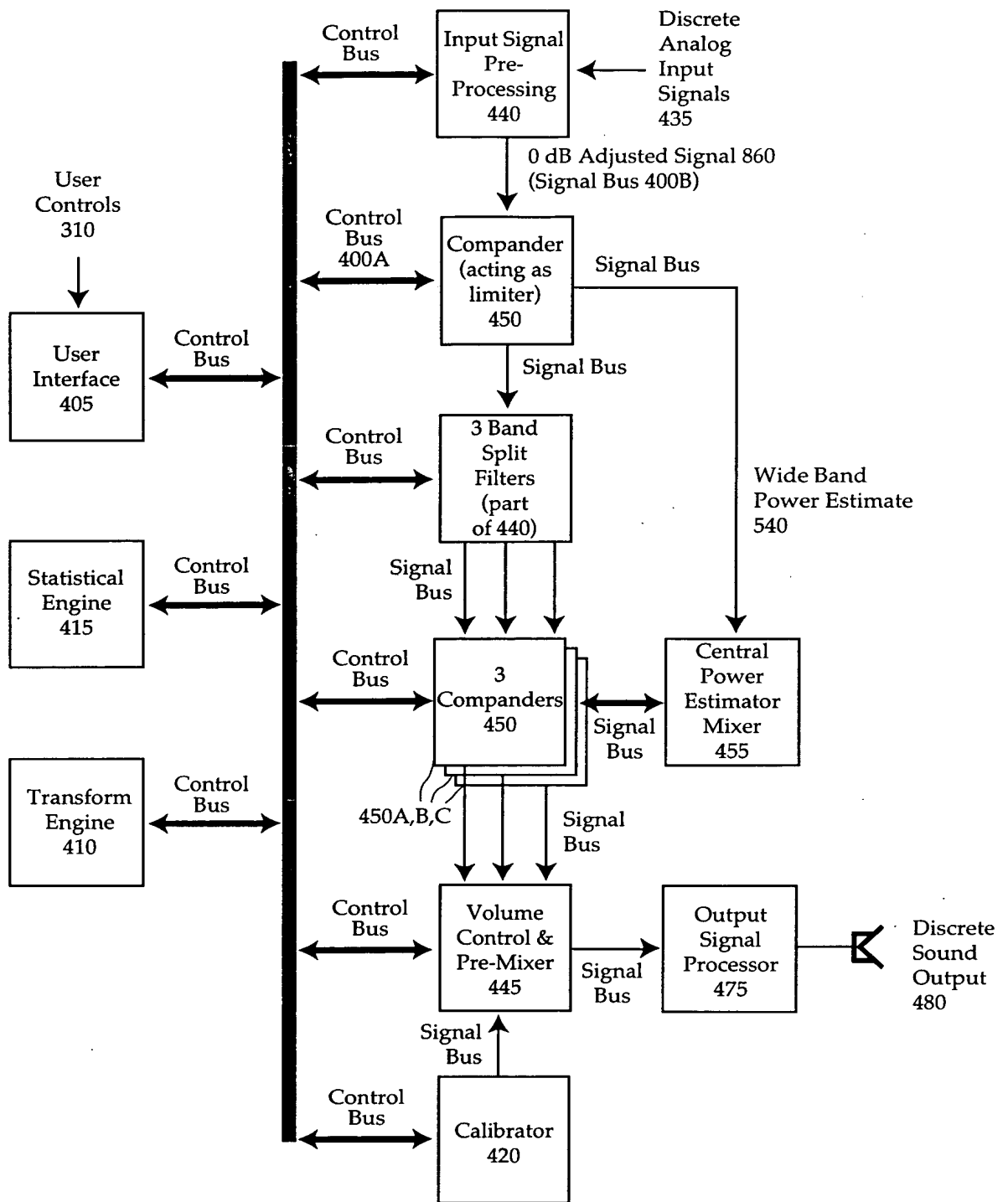


FIG. 5G

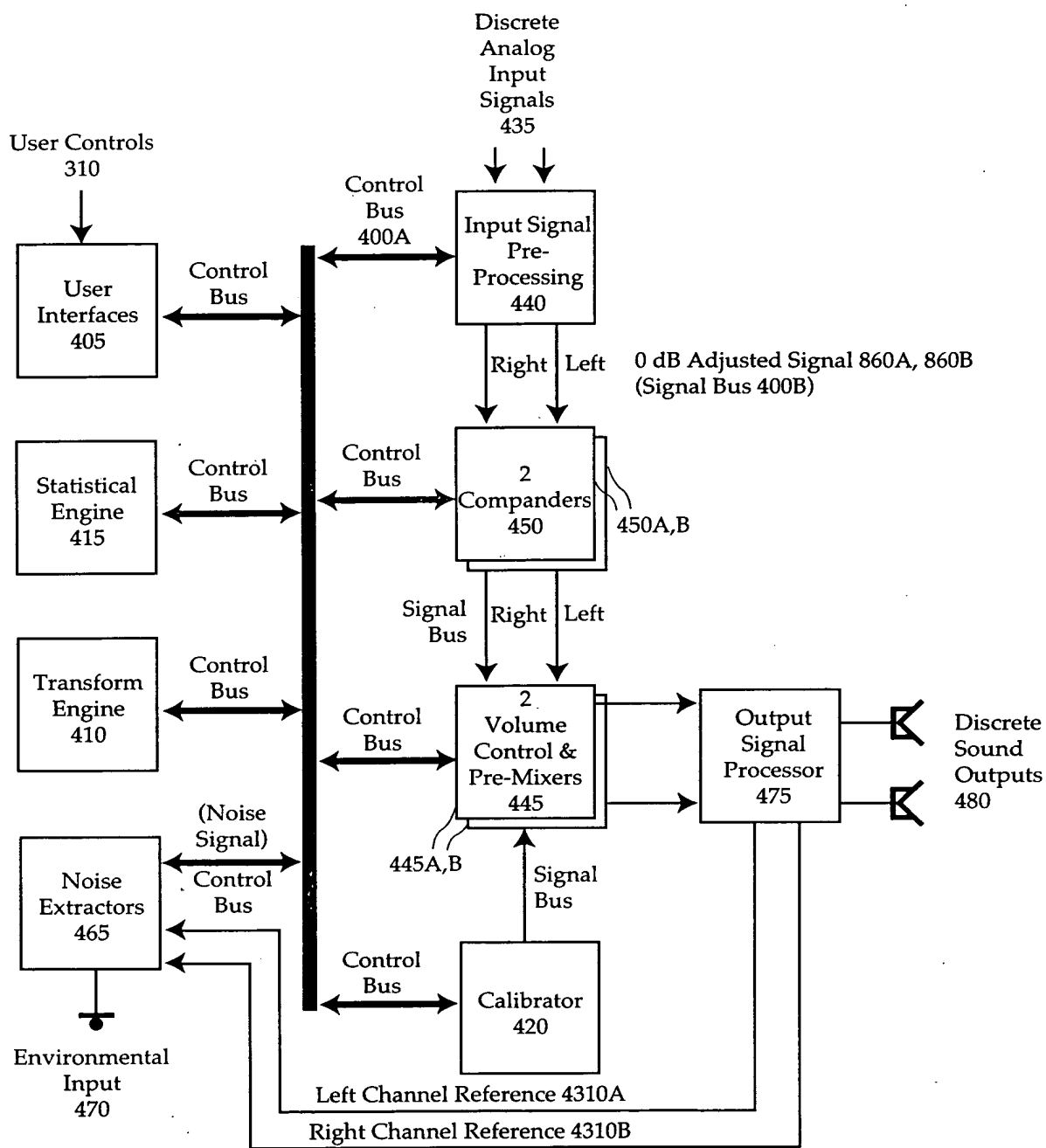


FIG. 5H

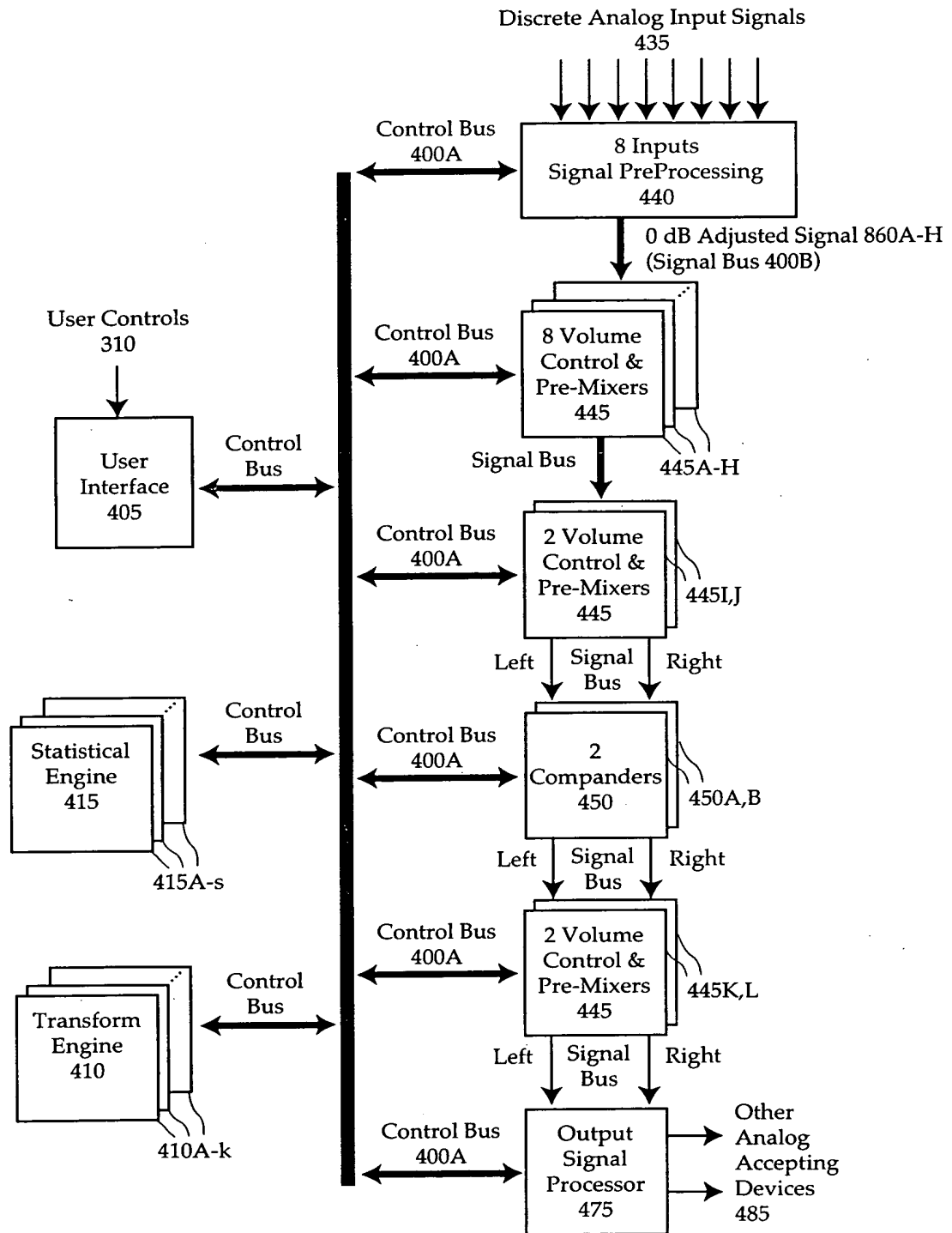


FIG. 5I

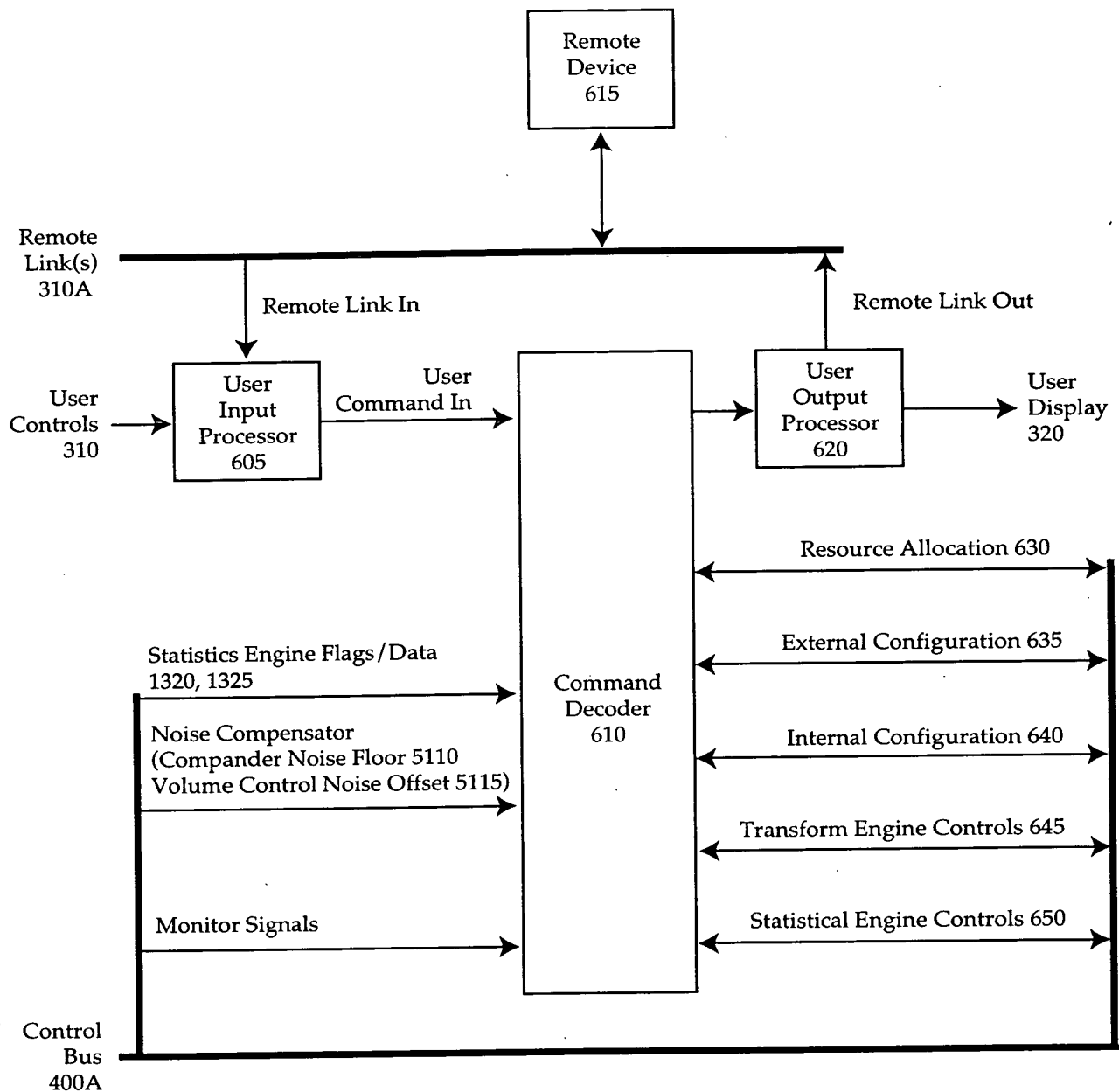


FIG. 6A

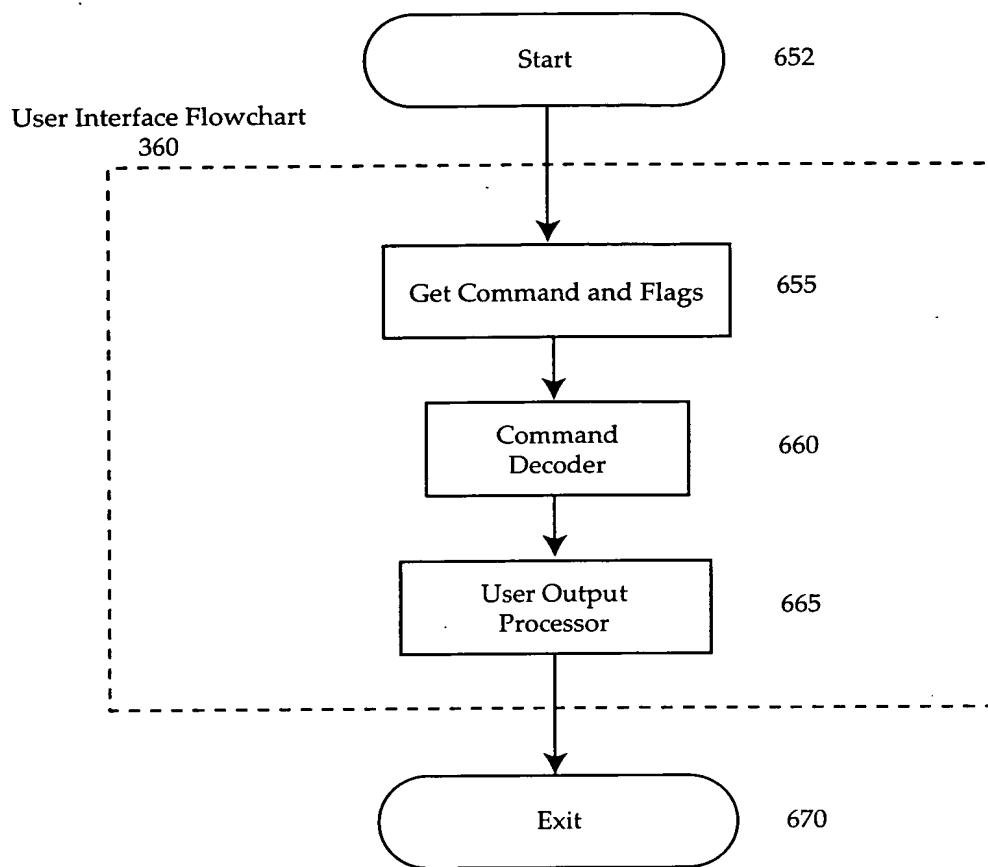


FIG. 6B

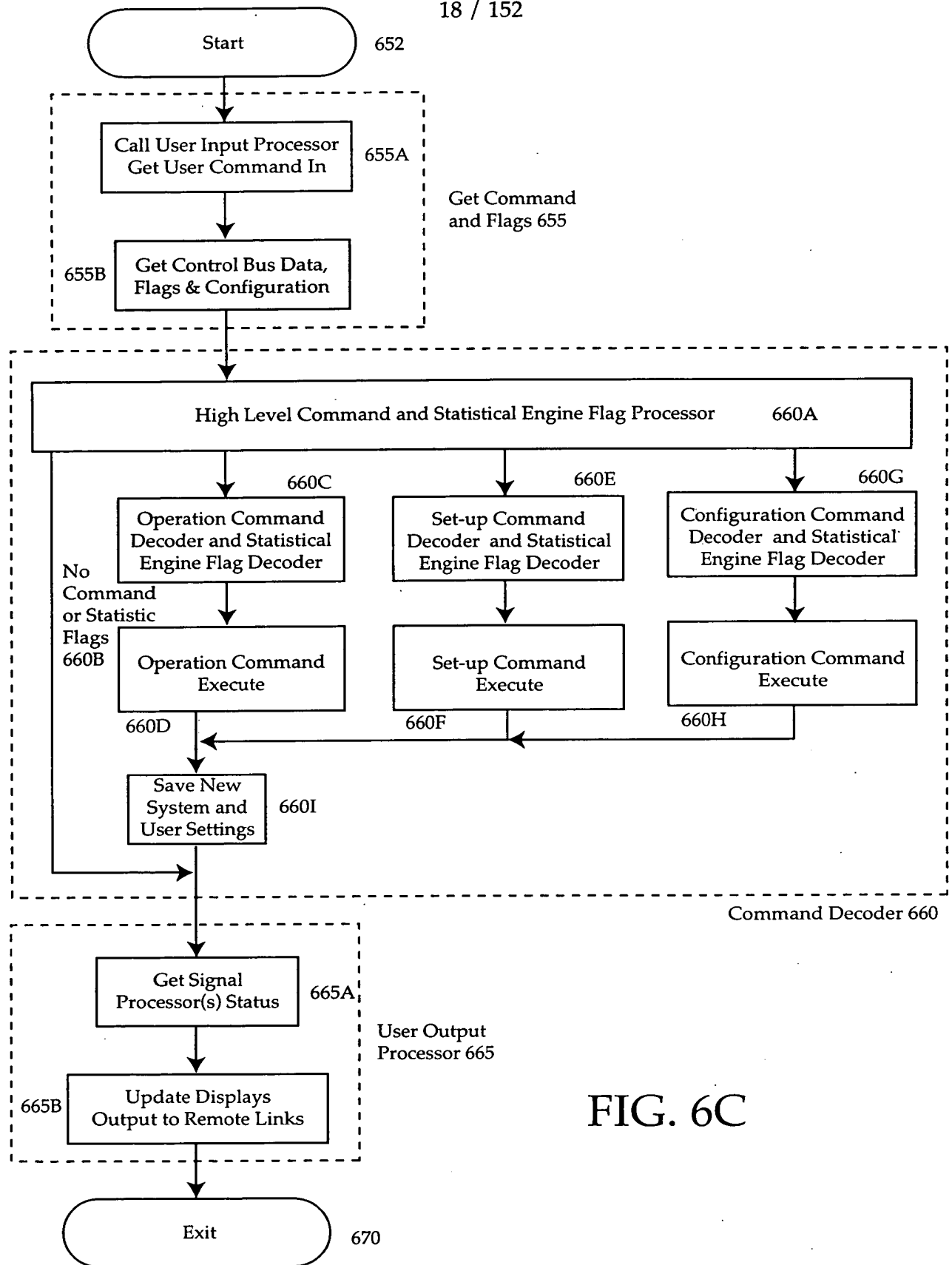


FIG. 6C

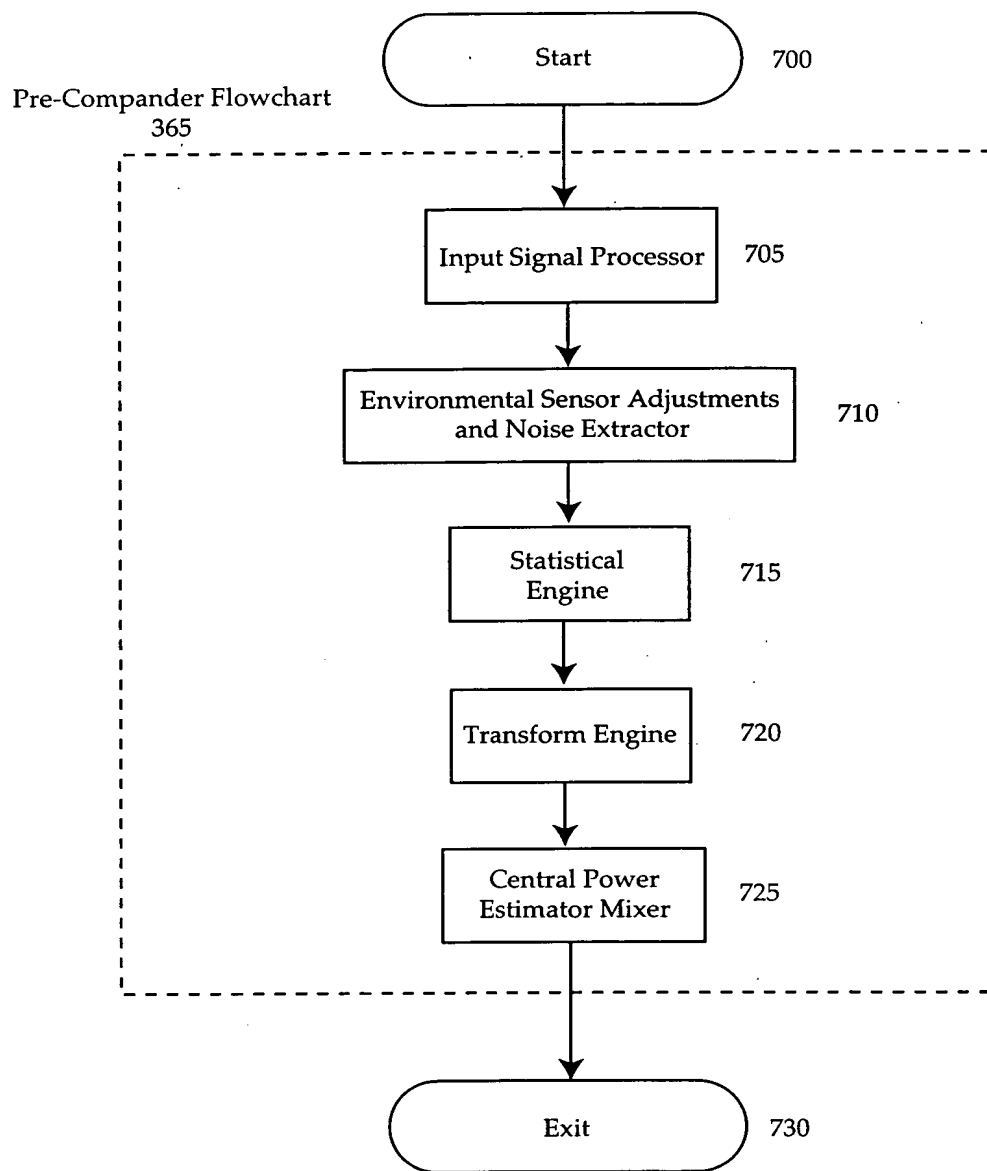


FIG. 7

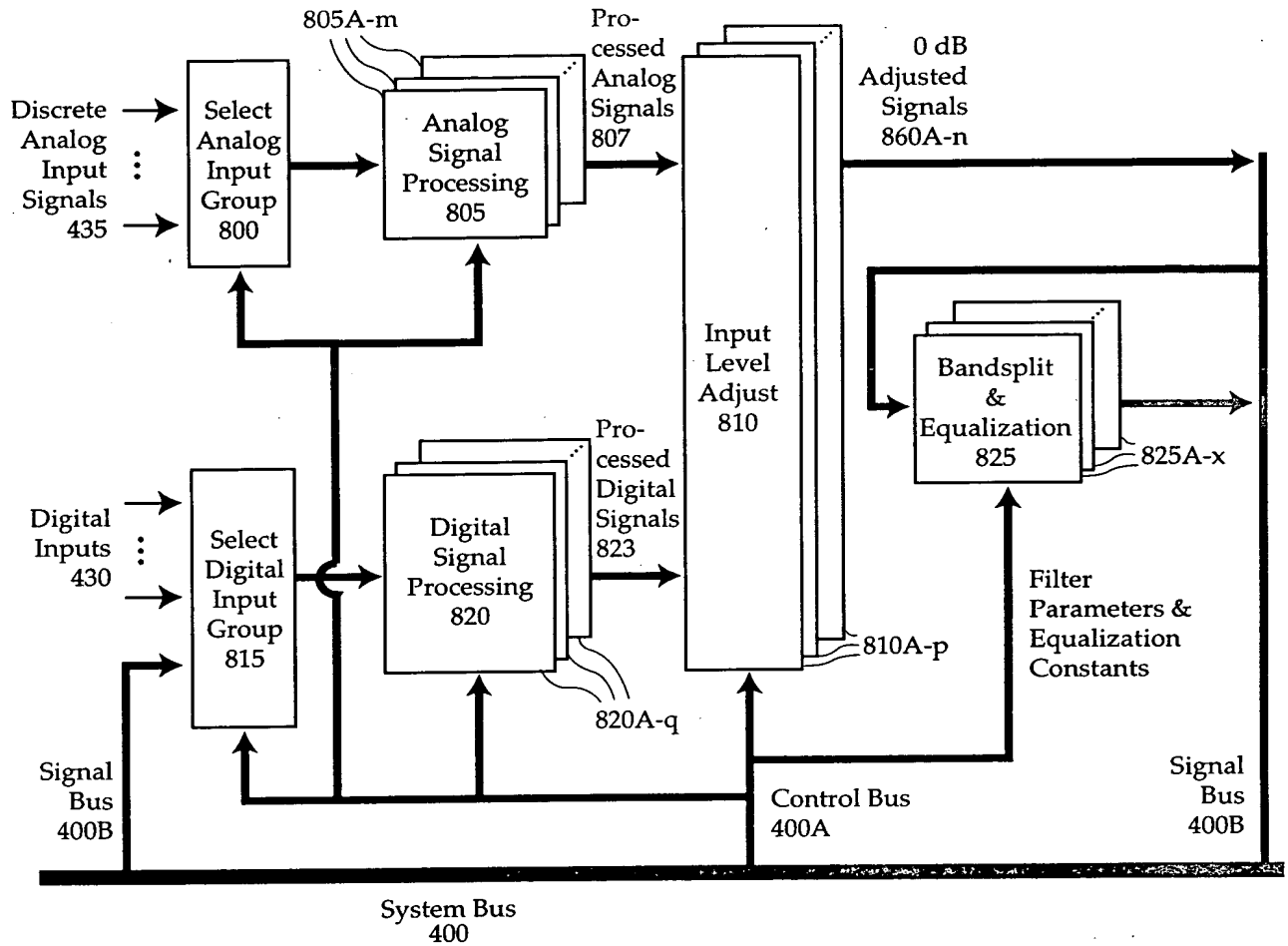


FIG. 8A

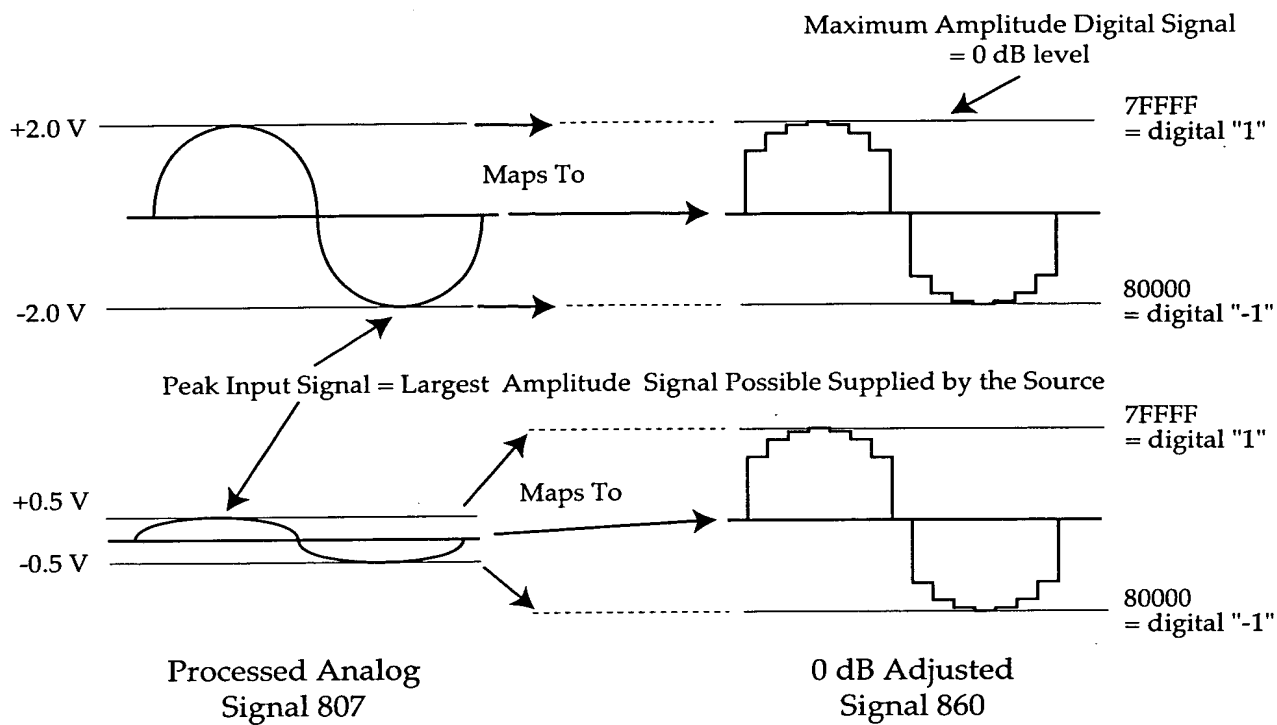


FIG. 8B

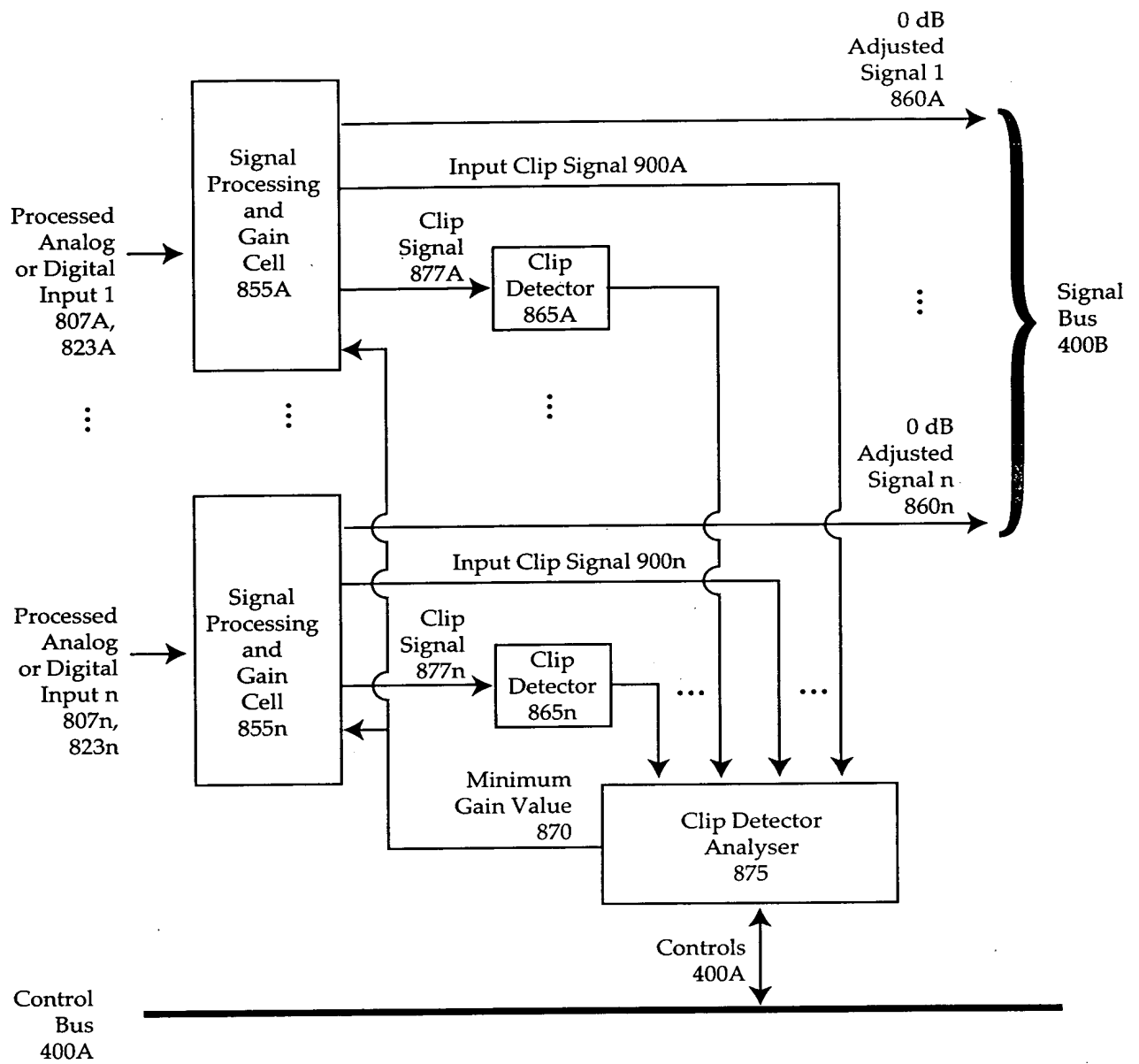


FIG. 8C

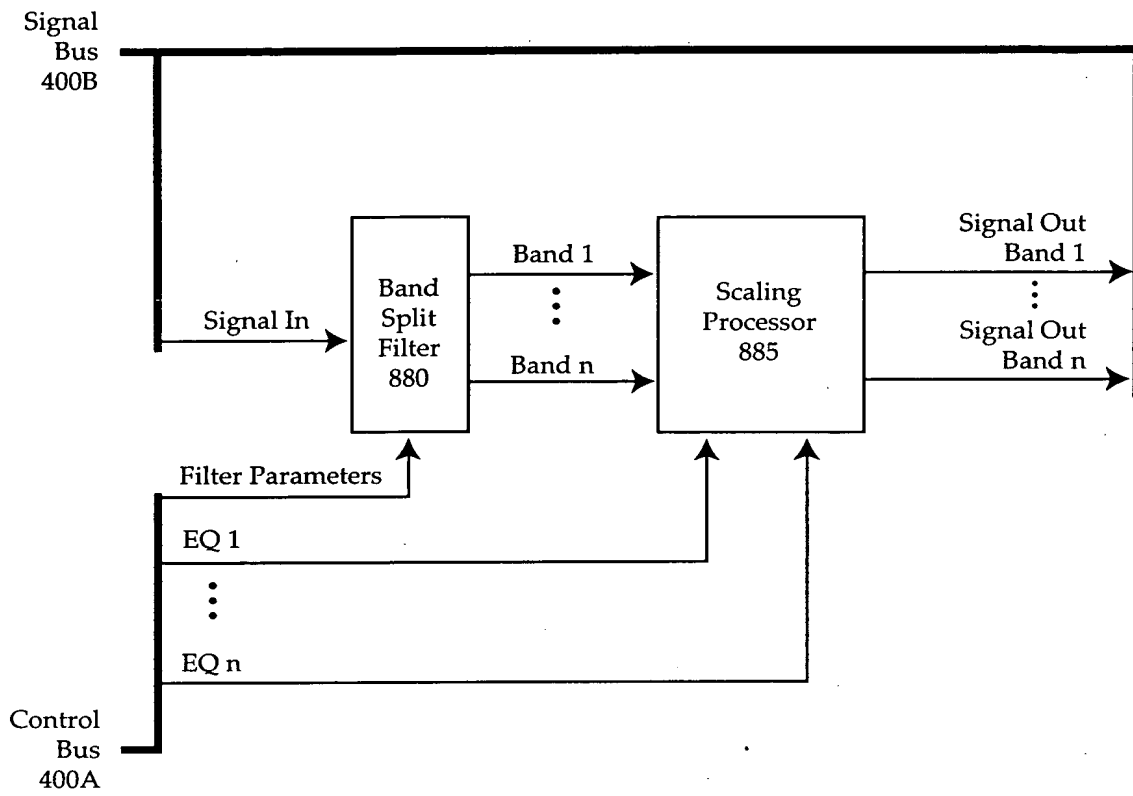


FIG. 8D

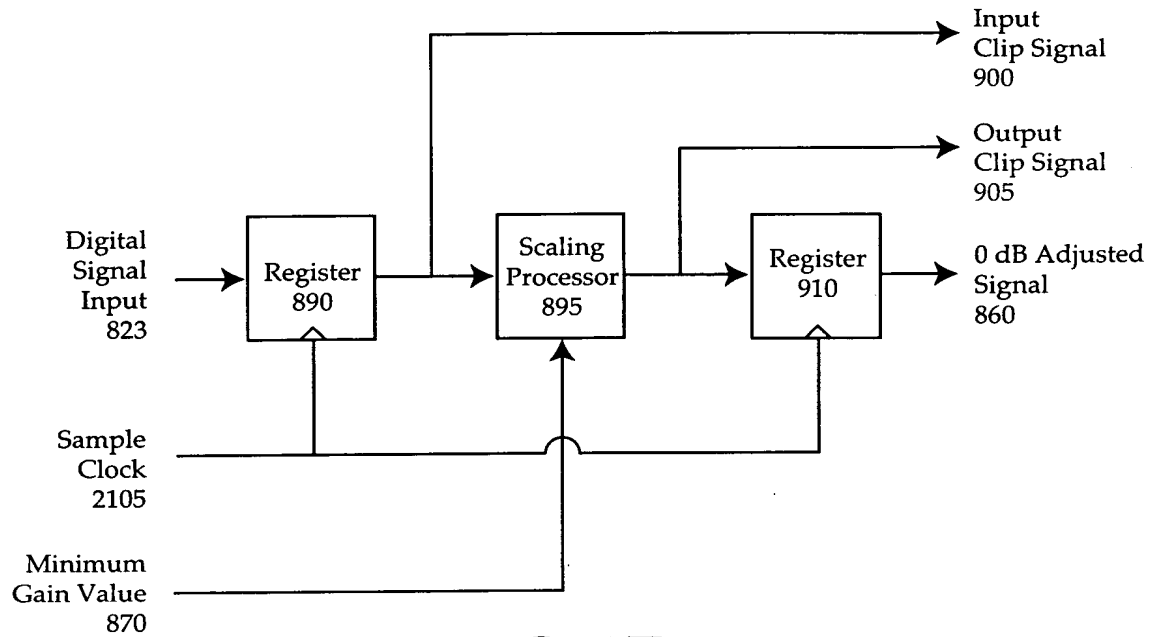


FIG. 8E

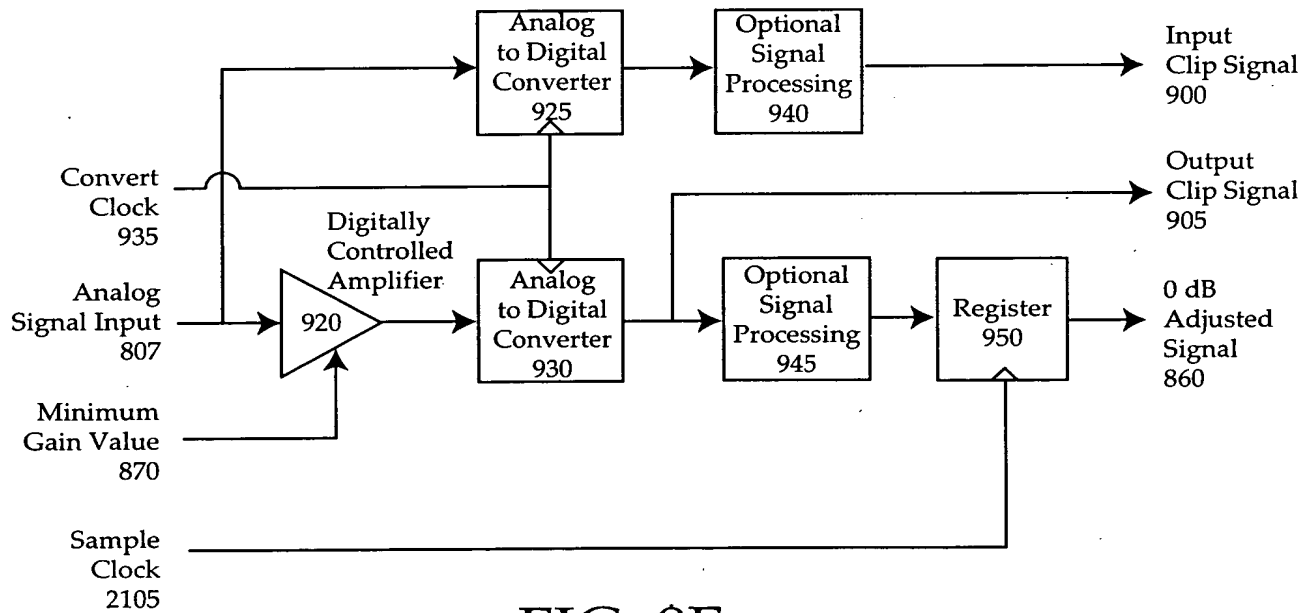


FIG. 8F

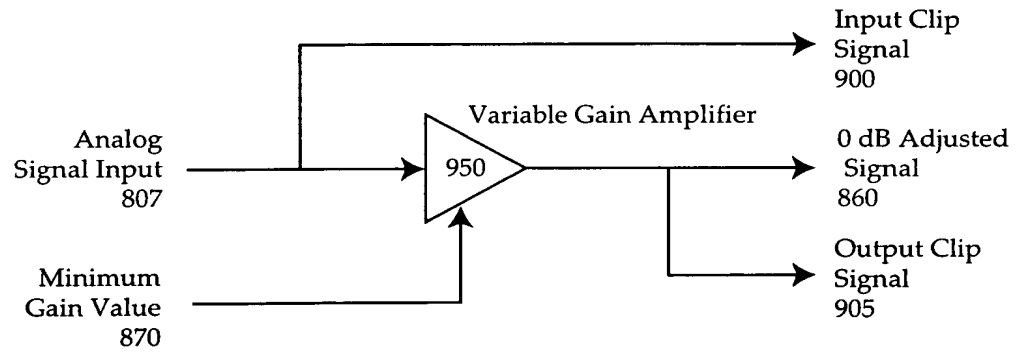


FIG. 8G

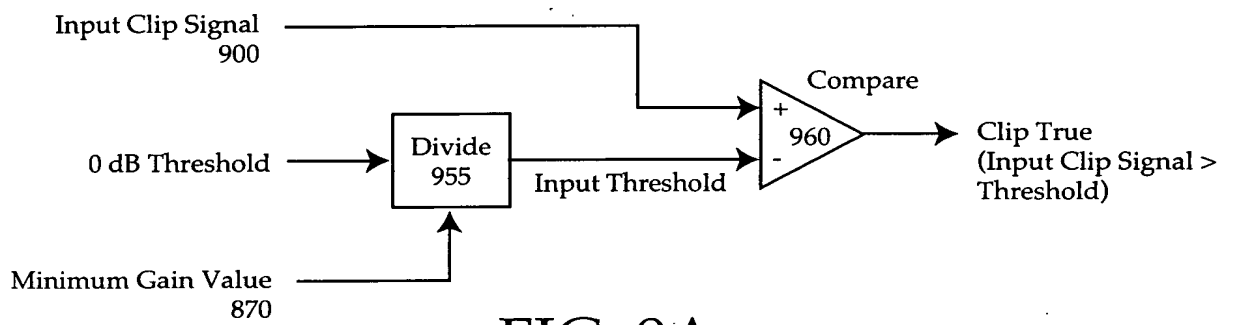


FIG. 9A

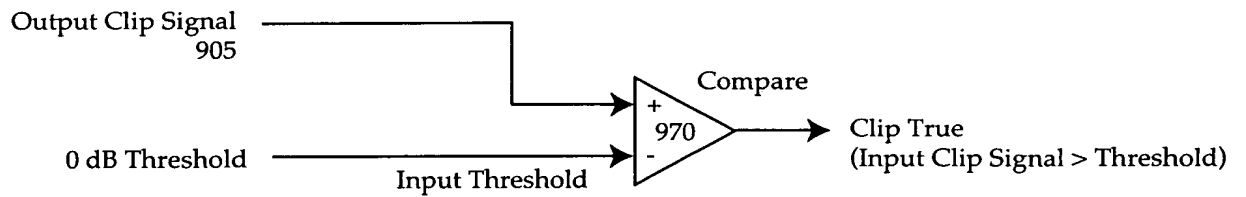


FIG. 9B

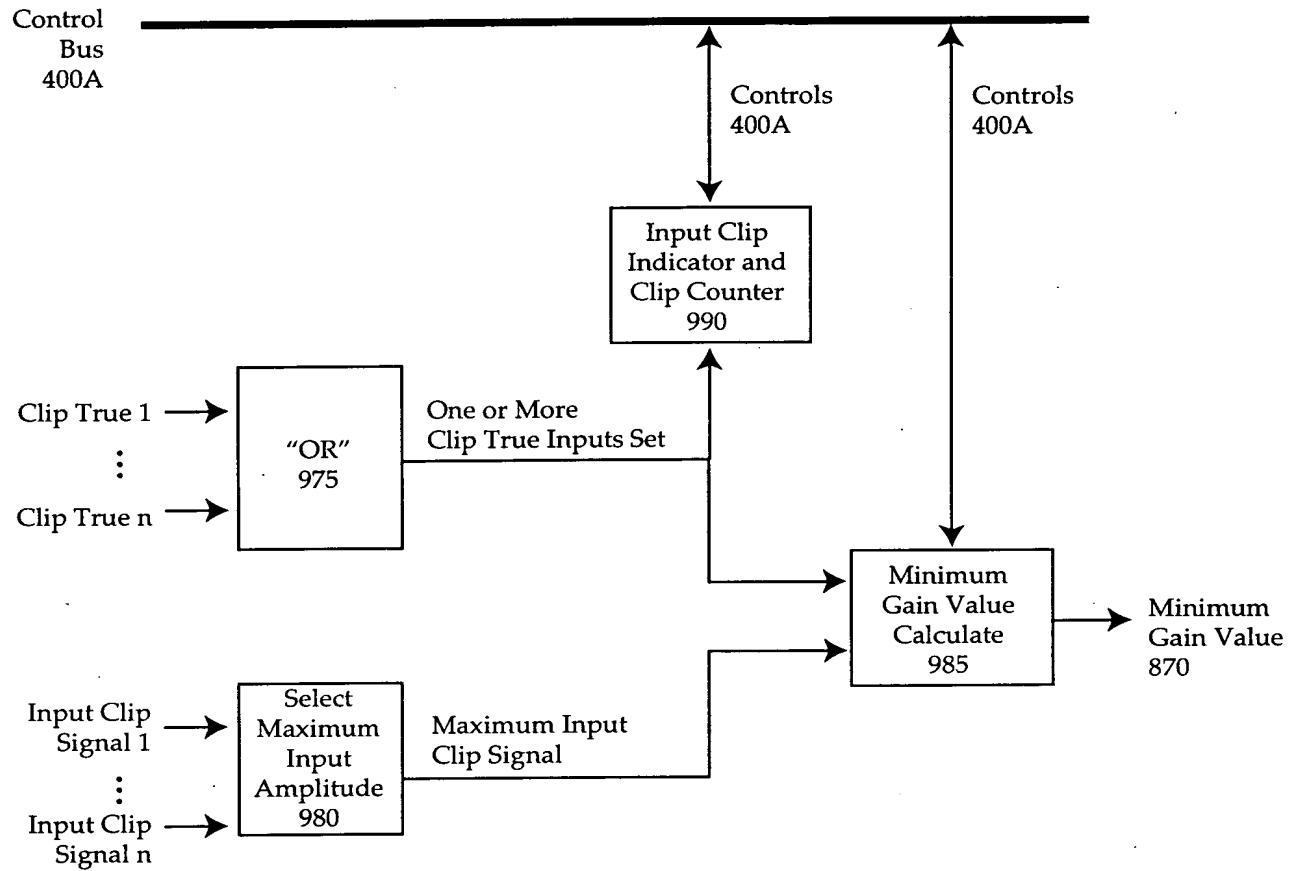
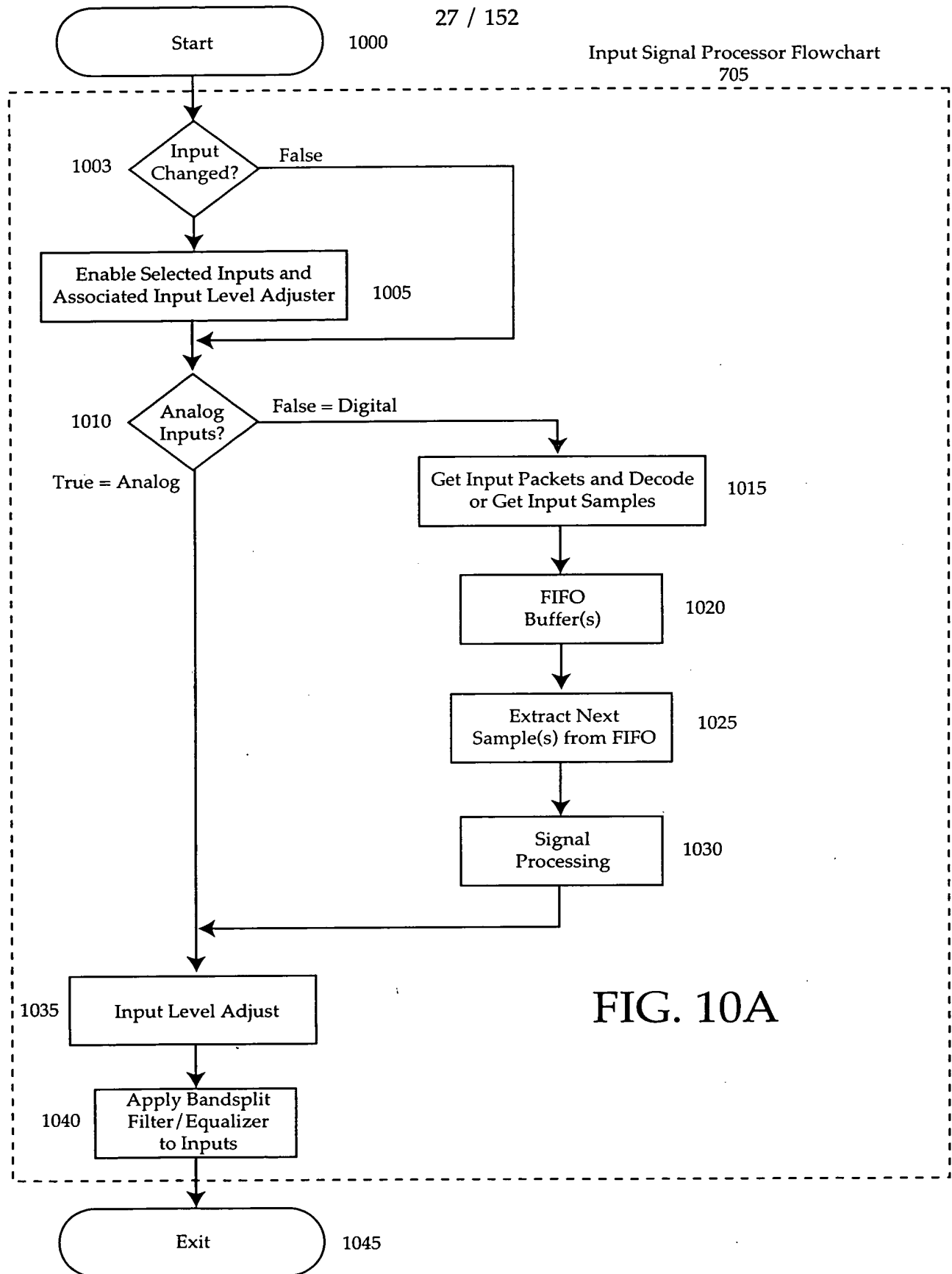


FIG. 9C

Input Signal Processor Flowchart
705

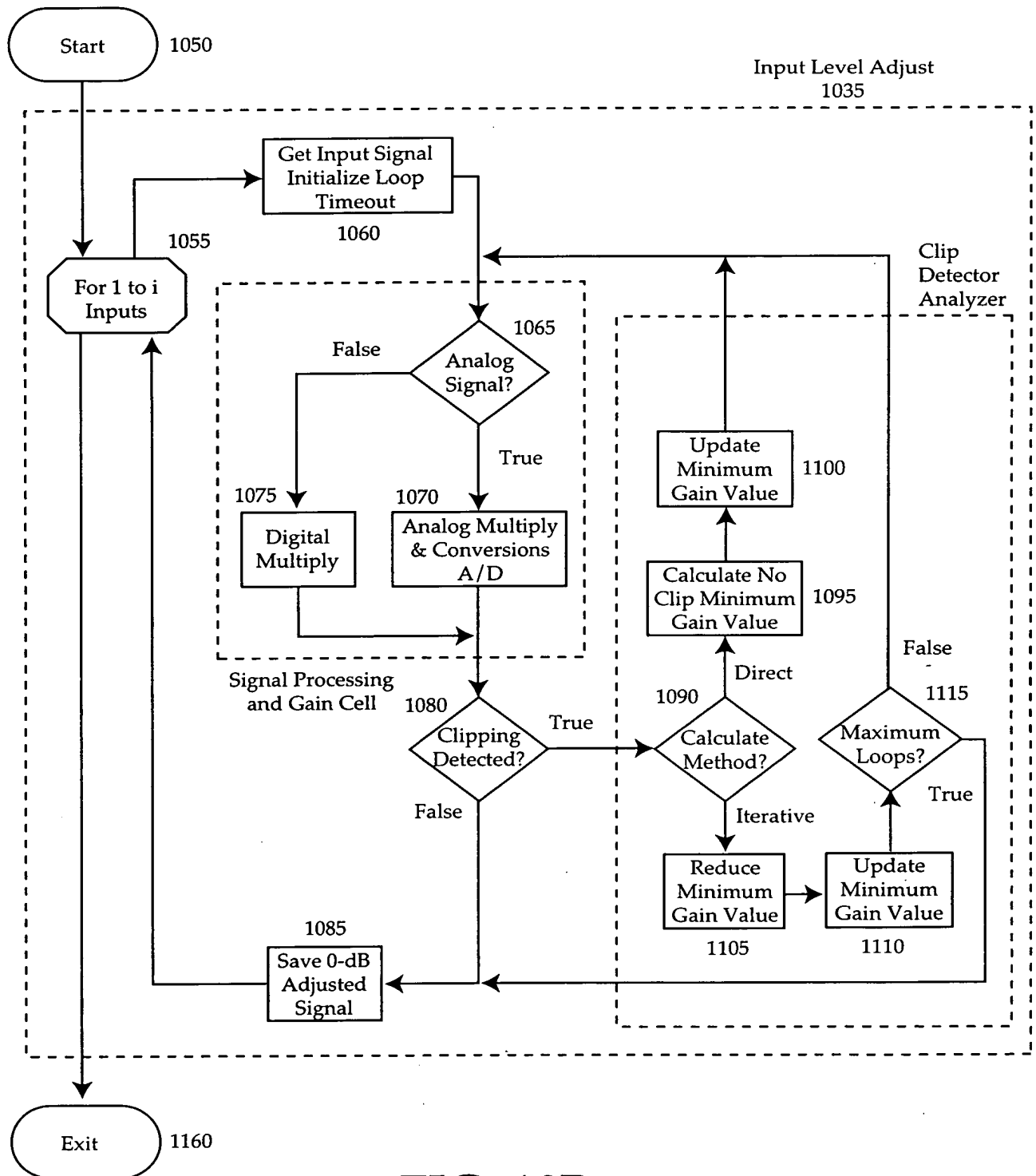
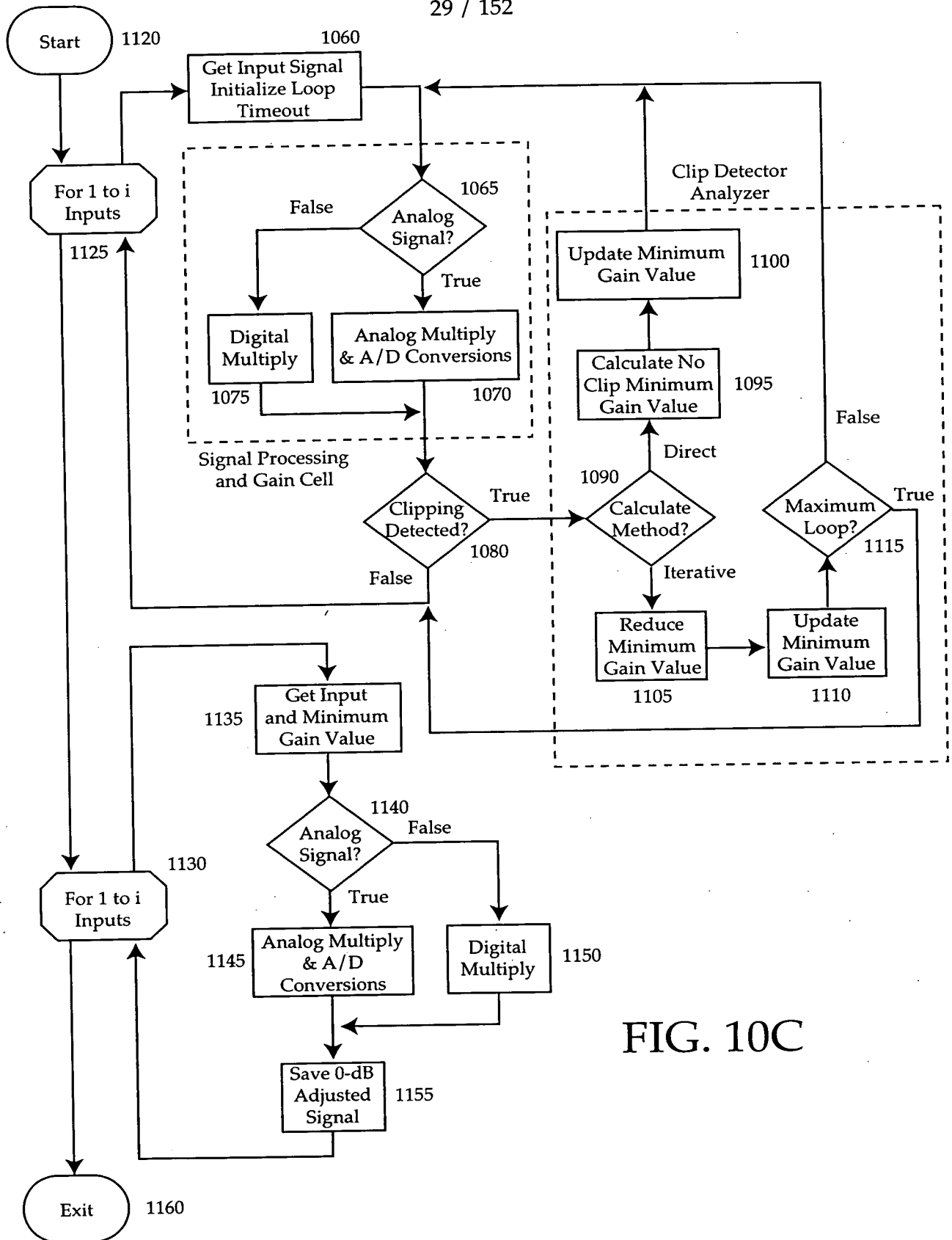


FIG. 10B



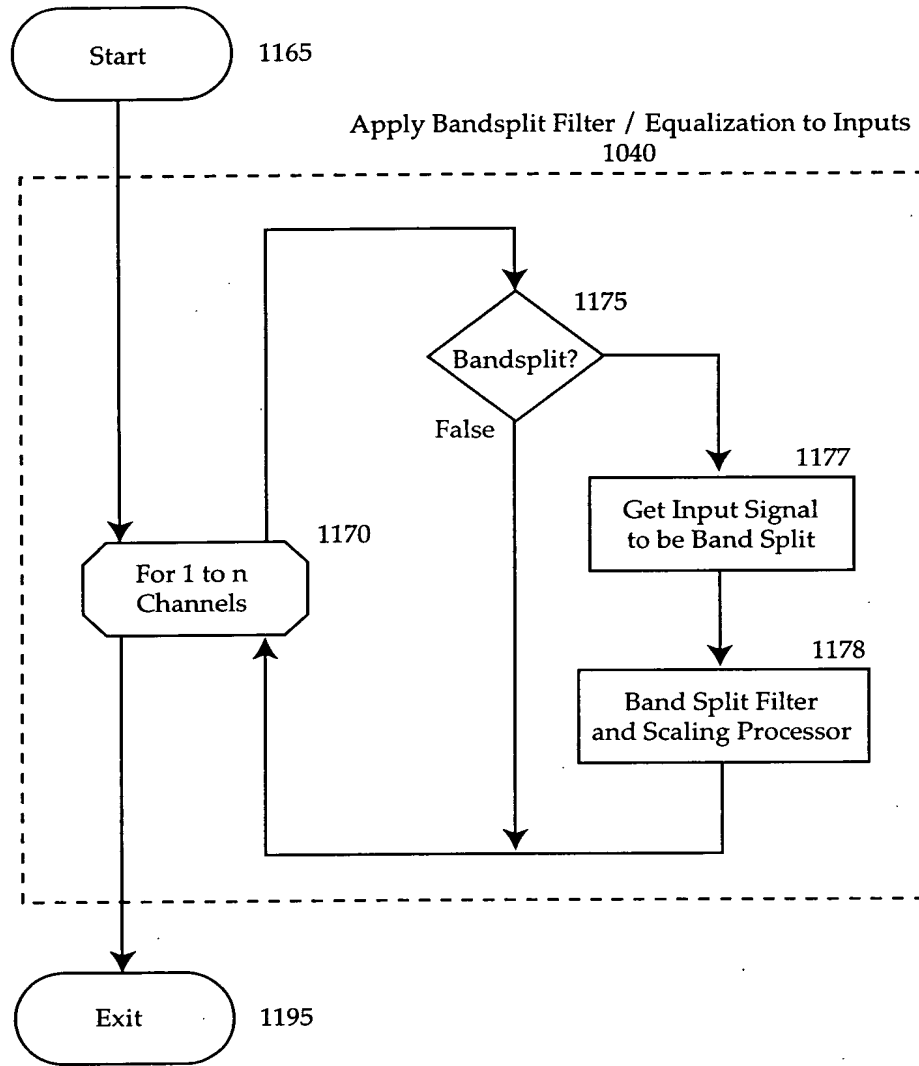


FIG. 10D

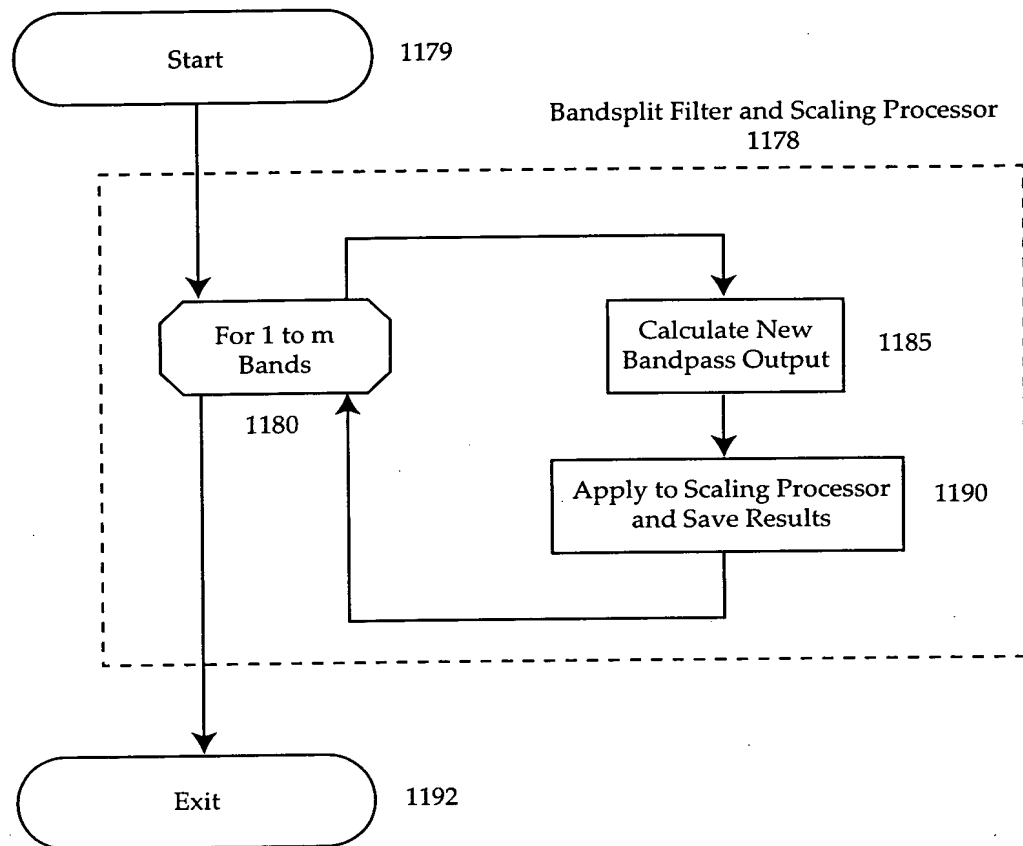


FIG. 10E

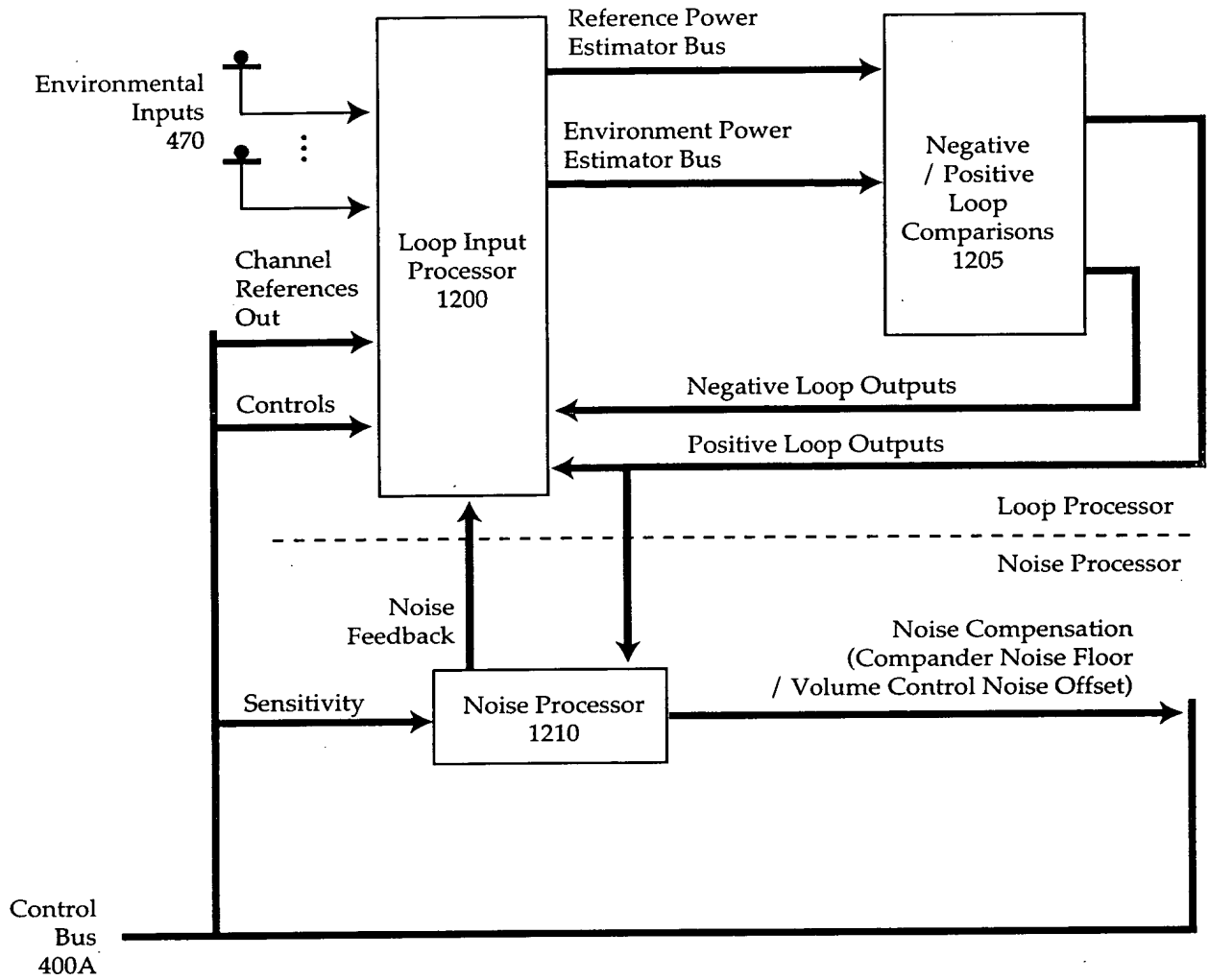


FIG. 11

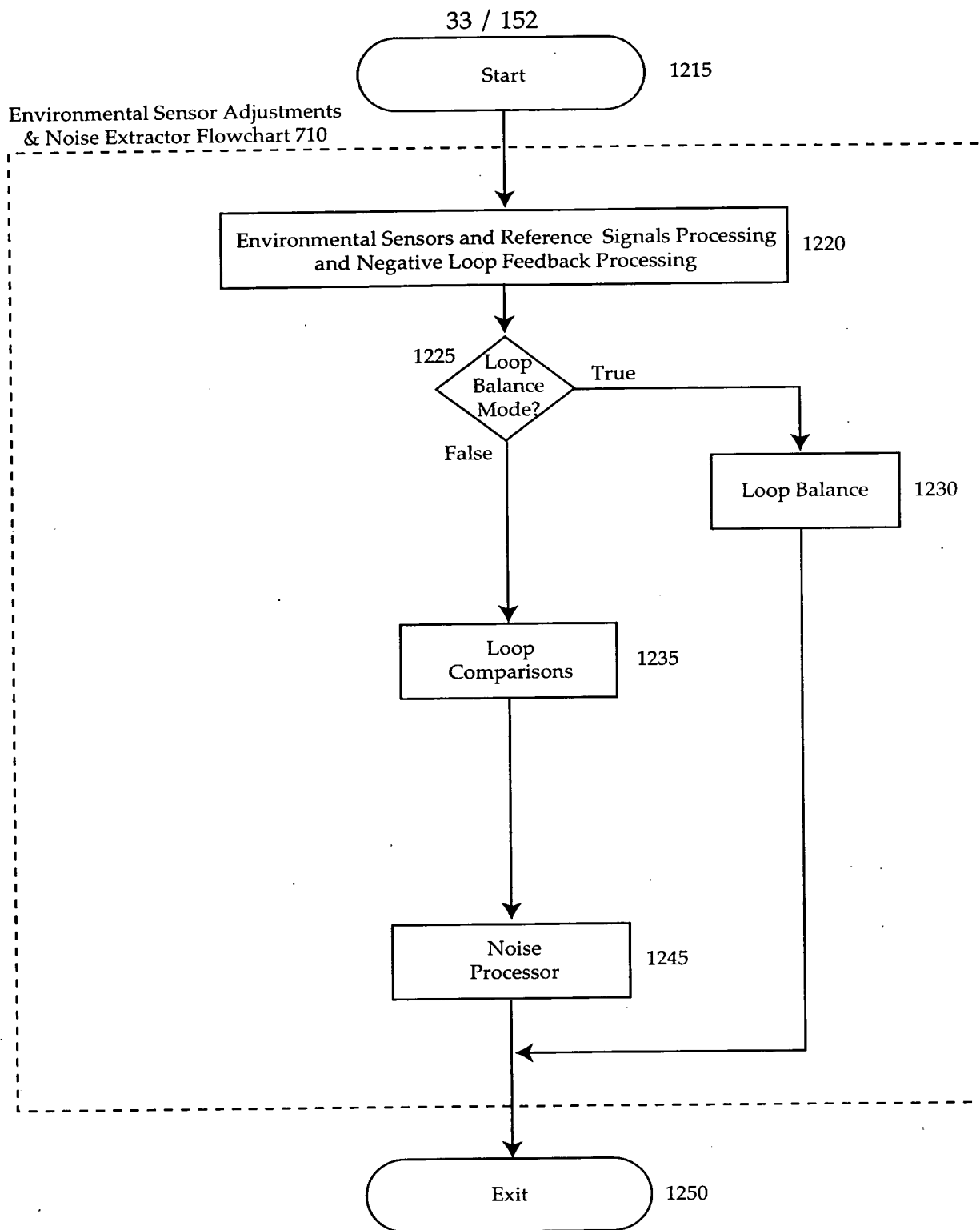
Environmental Sensor Adjustments
& Noise Extractor Flowchart 710

FIG. 12

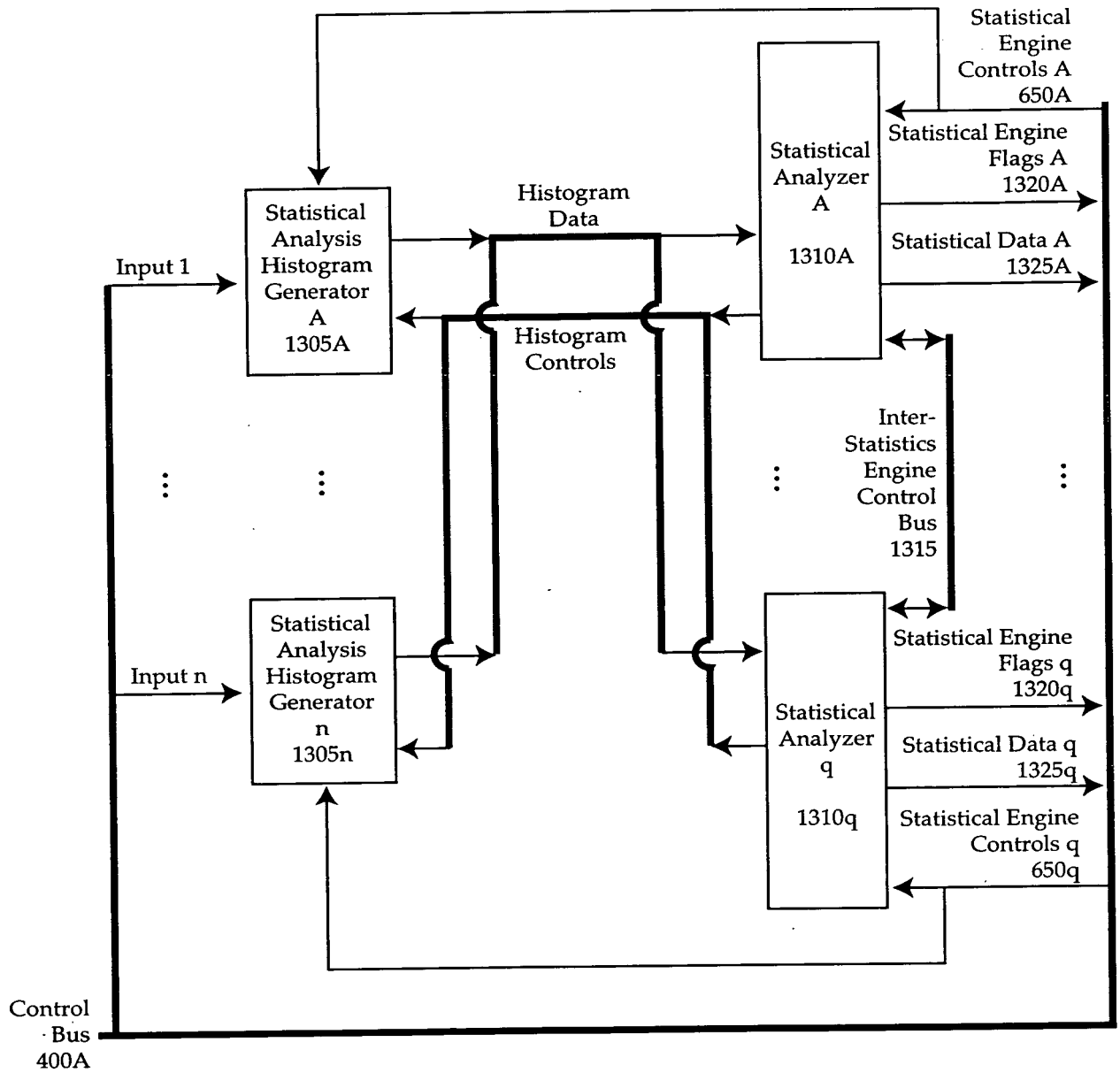


FIG. 13

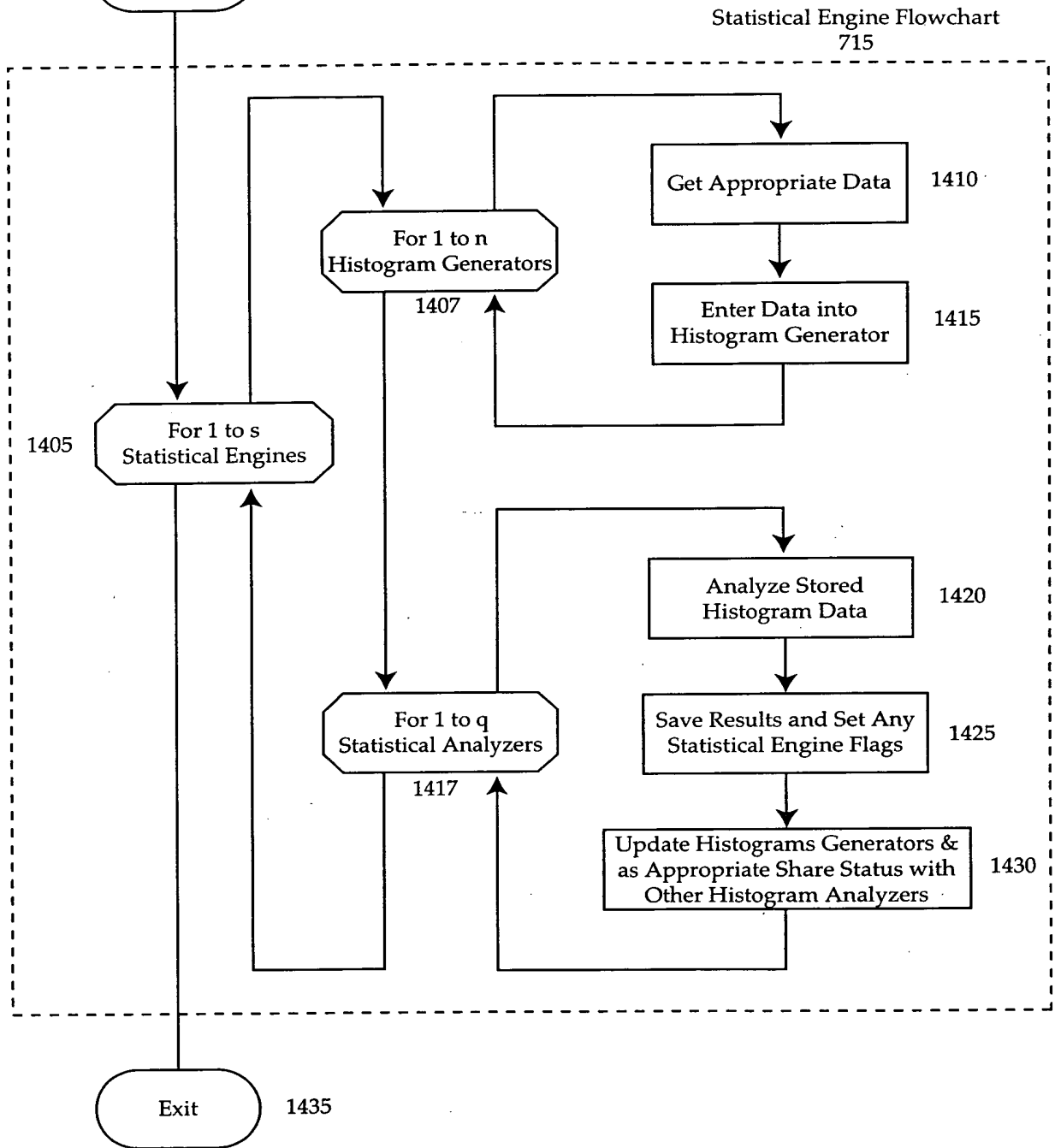


FIG. 14

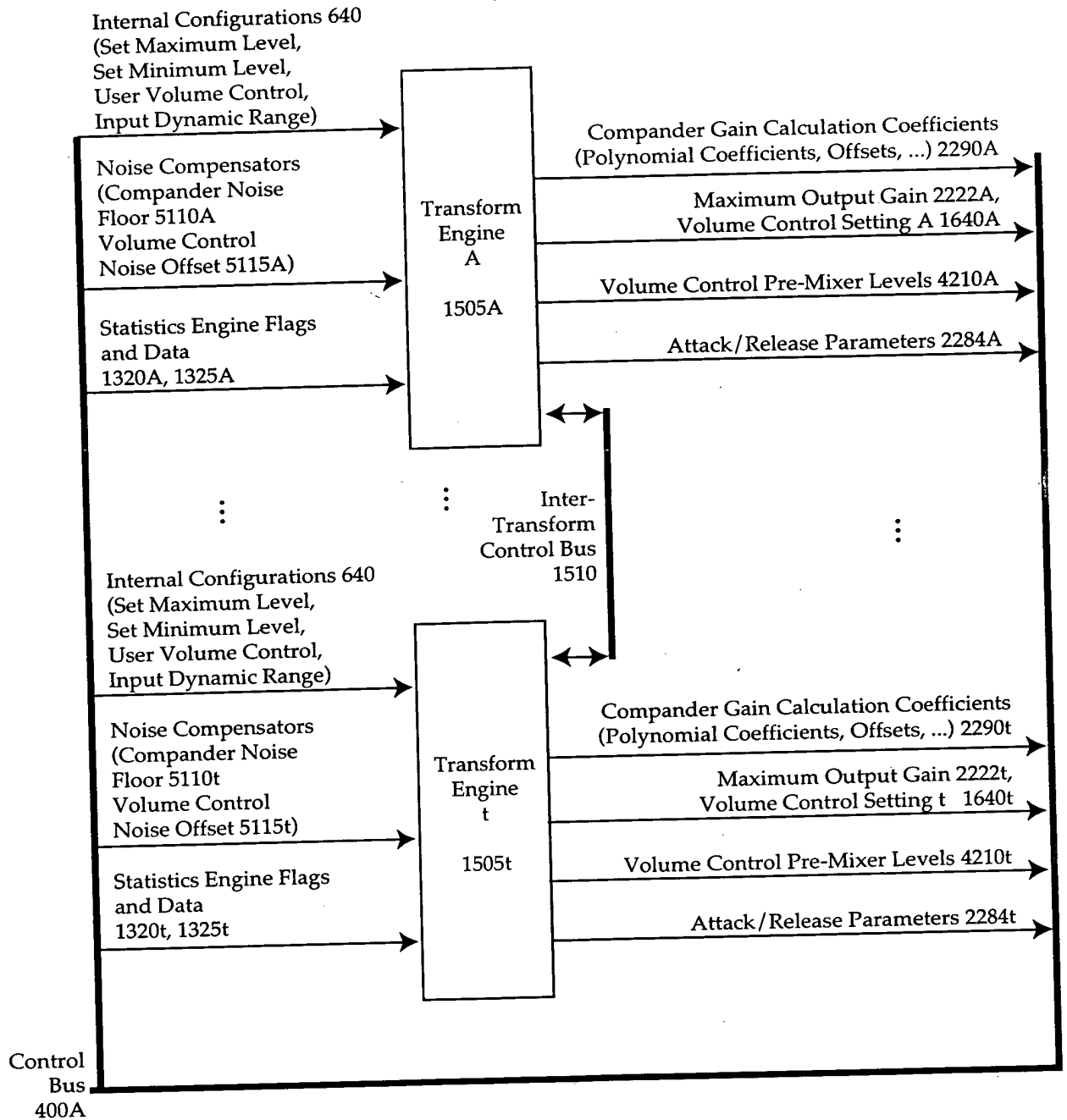


FIG. 15

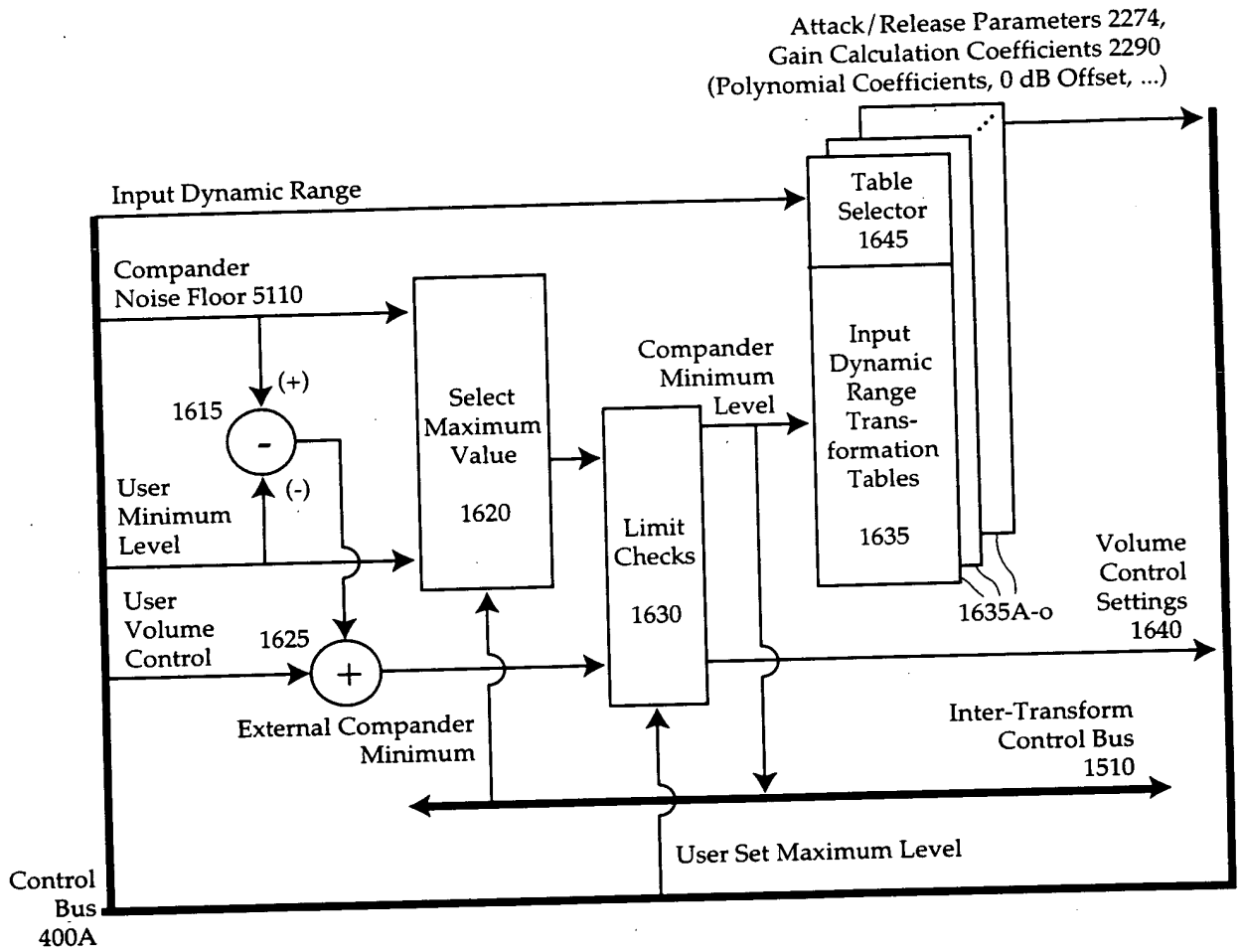


FIG. 16

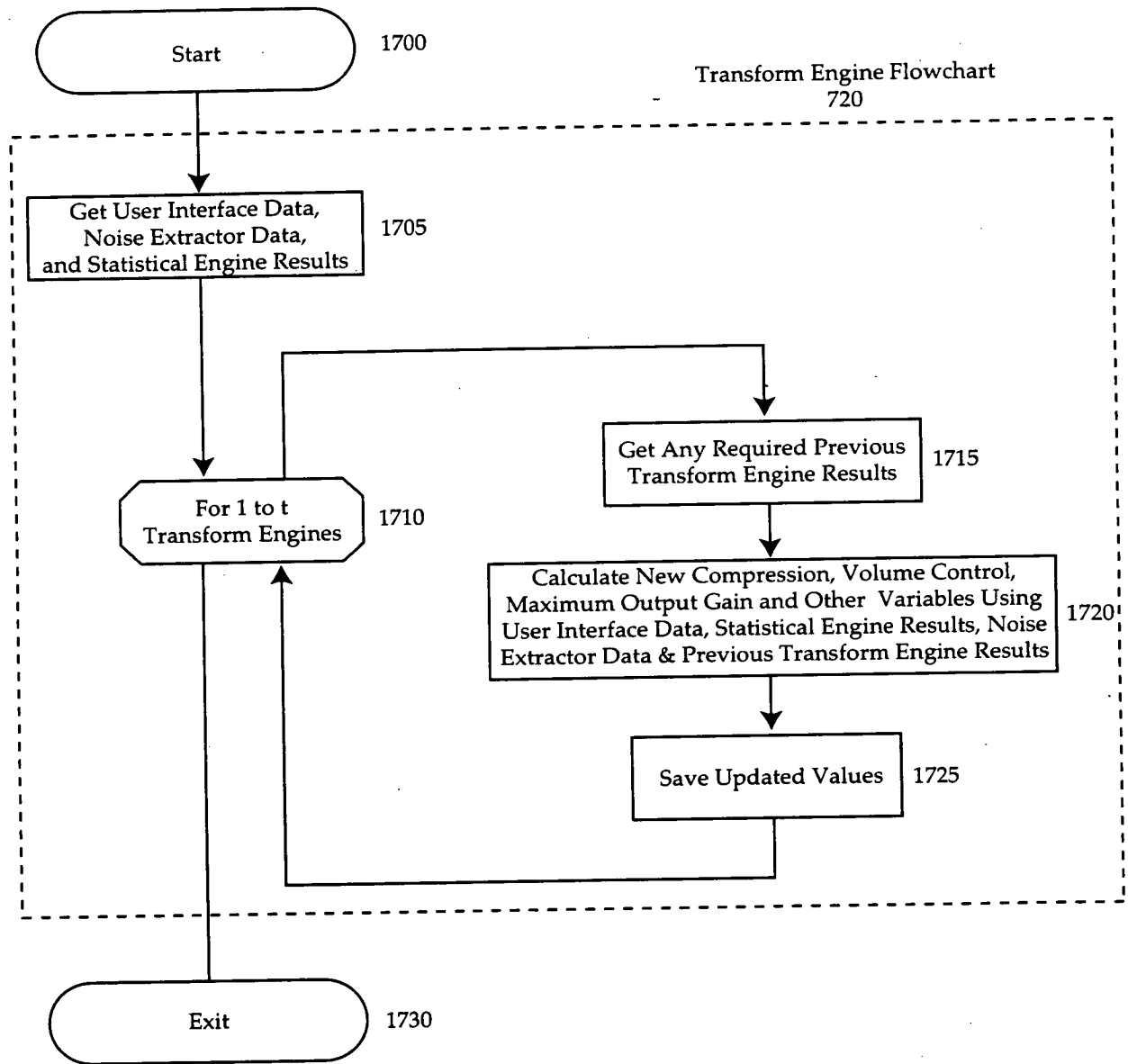


FIG. 17

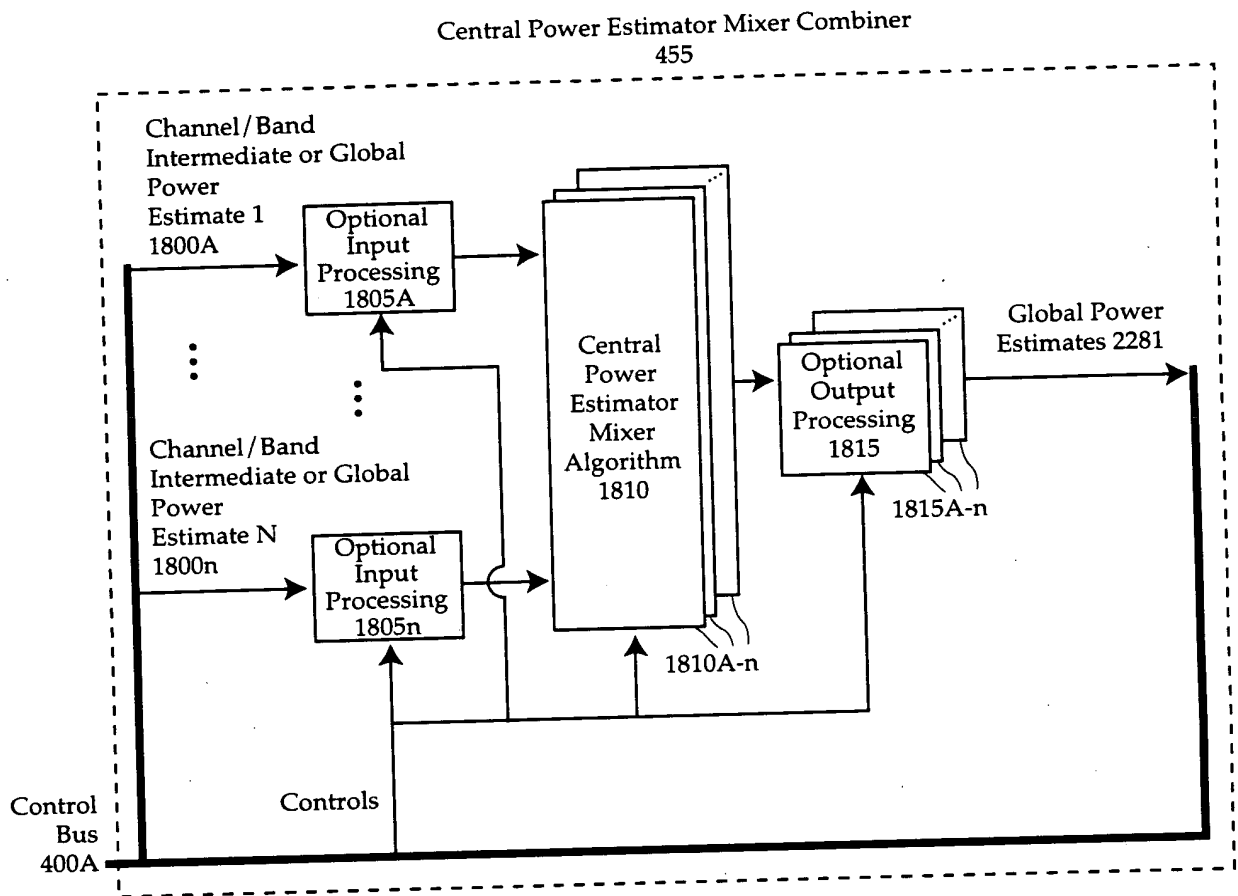


FIG. 18

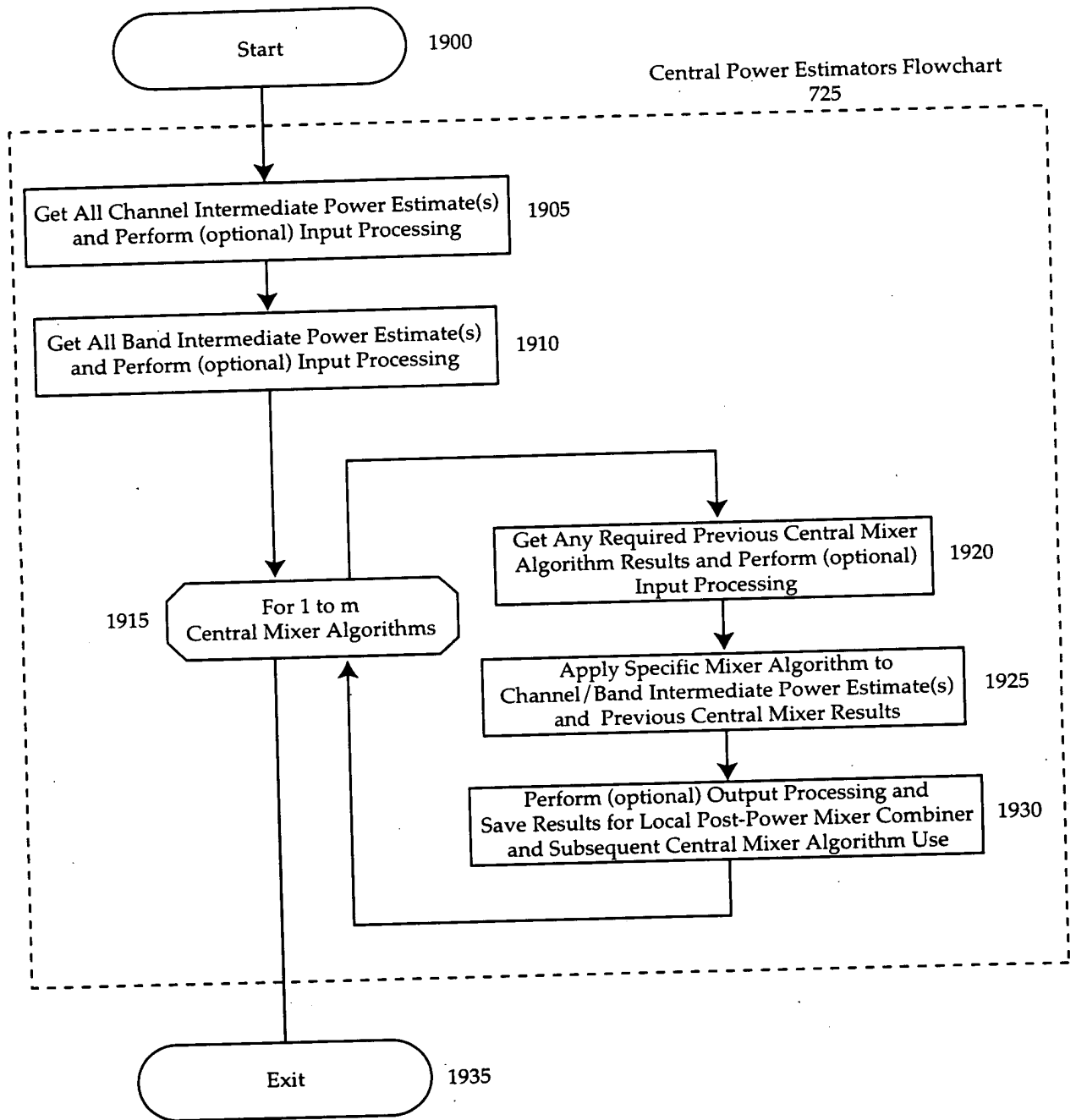


FIG. 19

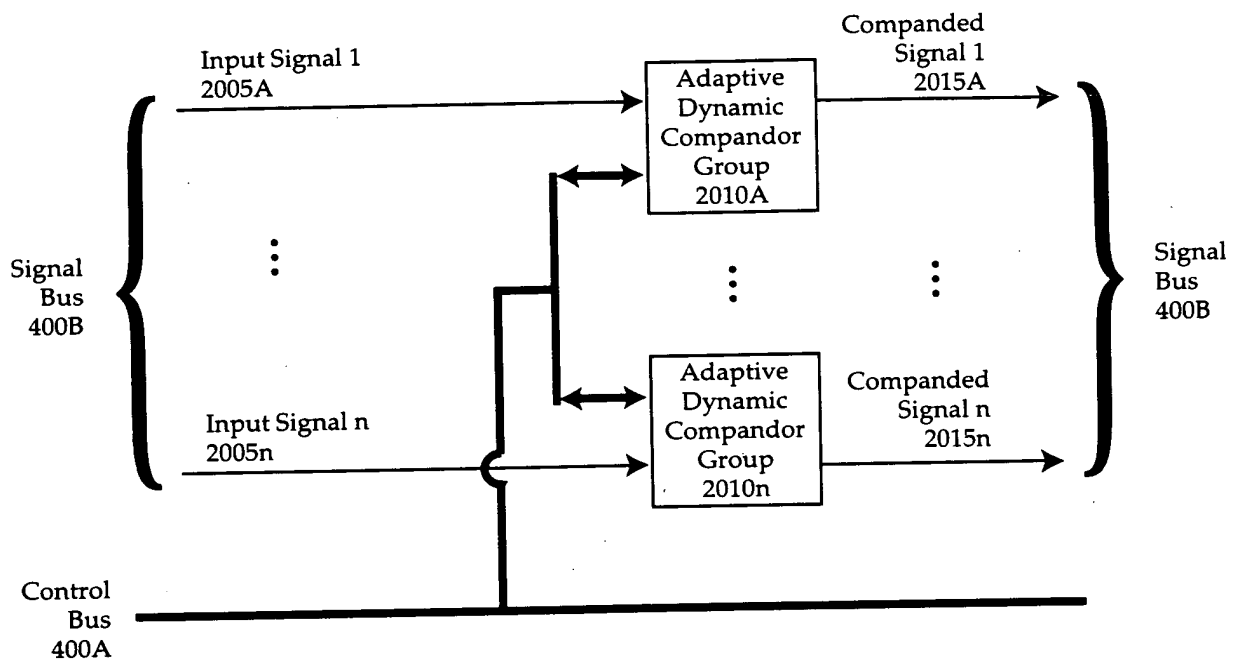


FIG. 20A

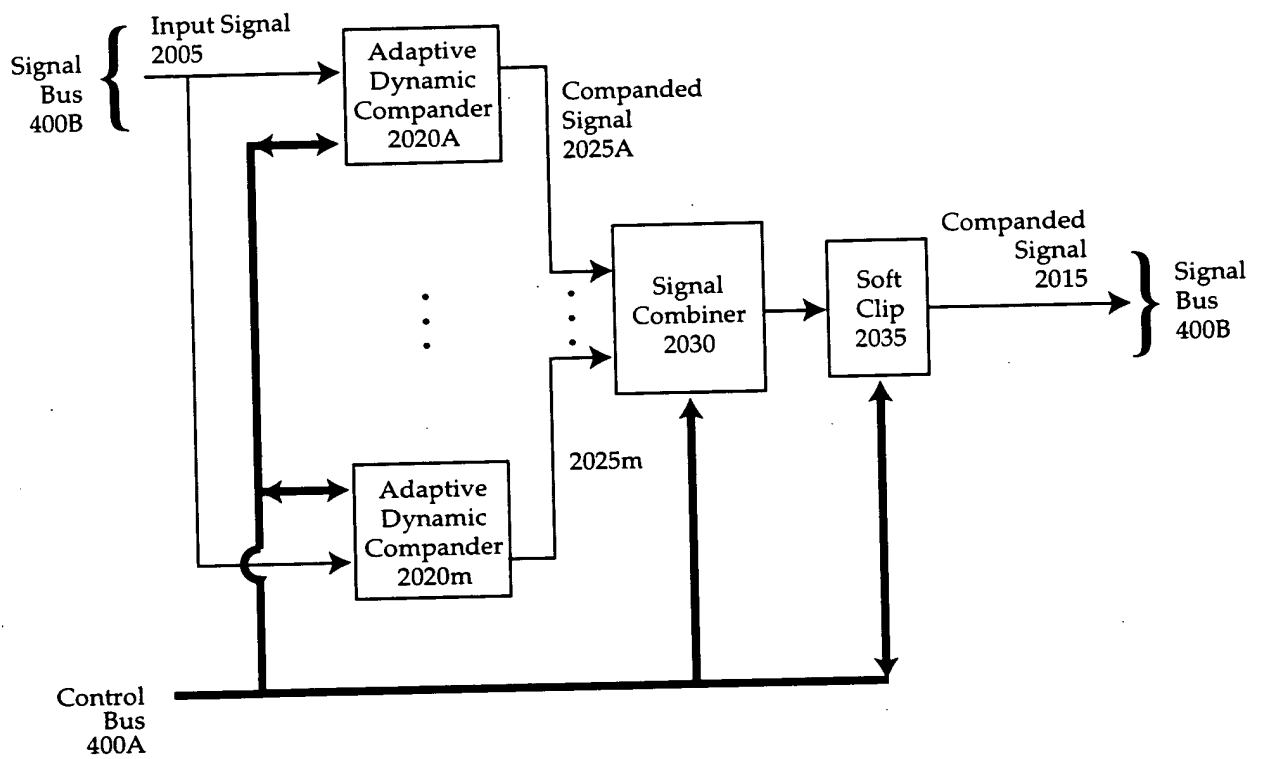


FIG. 20B

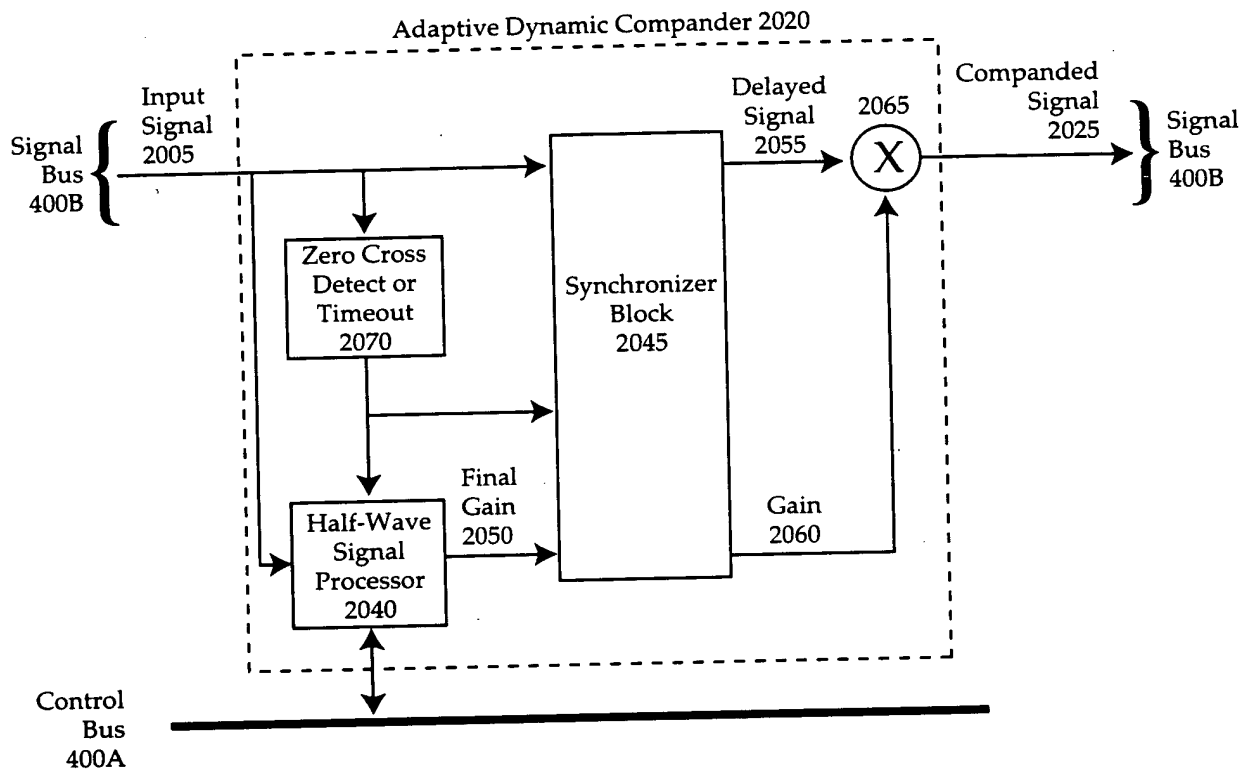


FIG. 20C

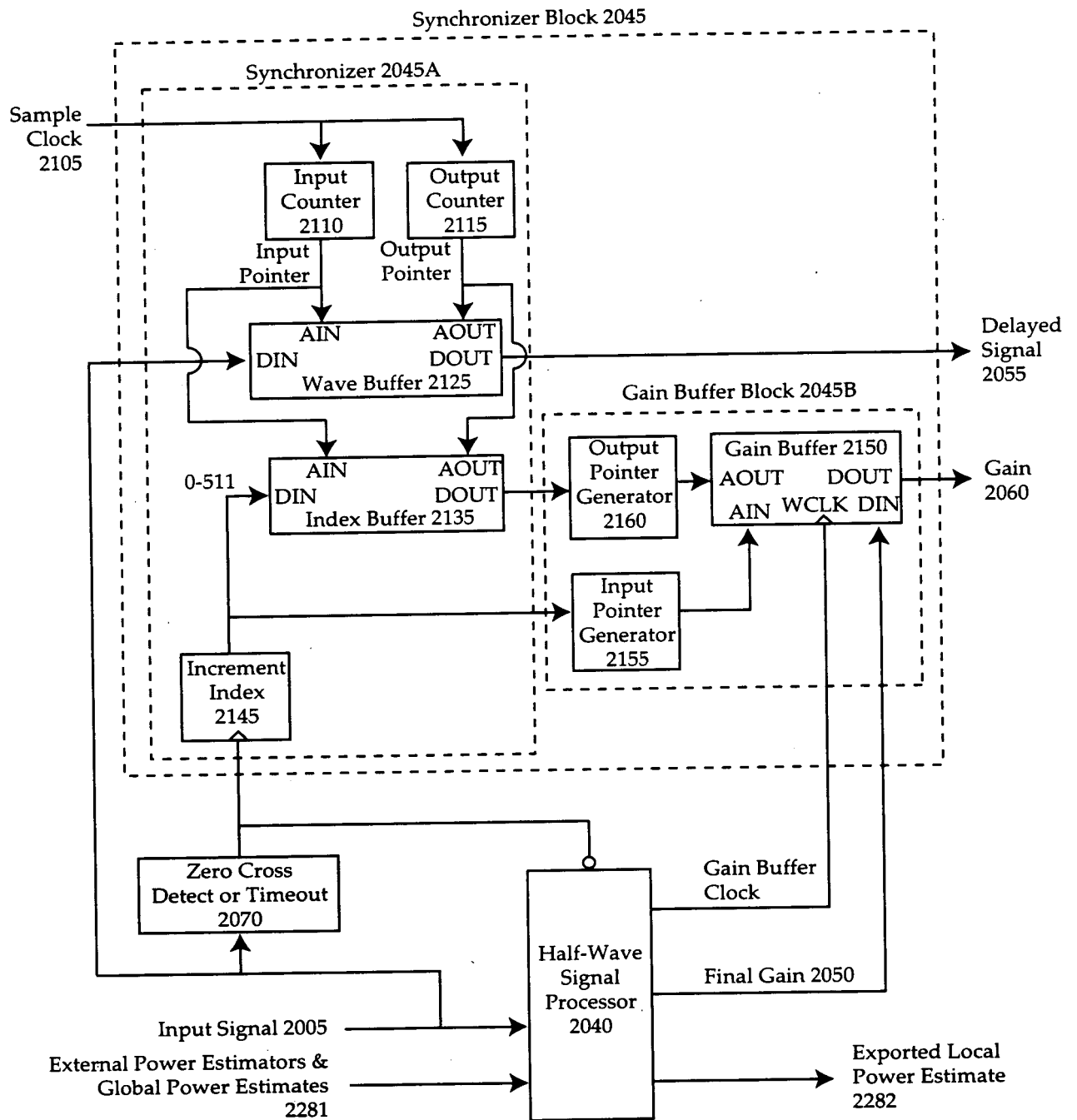


FIG. 21A

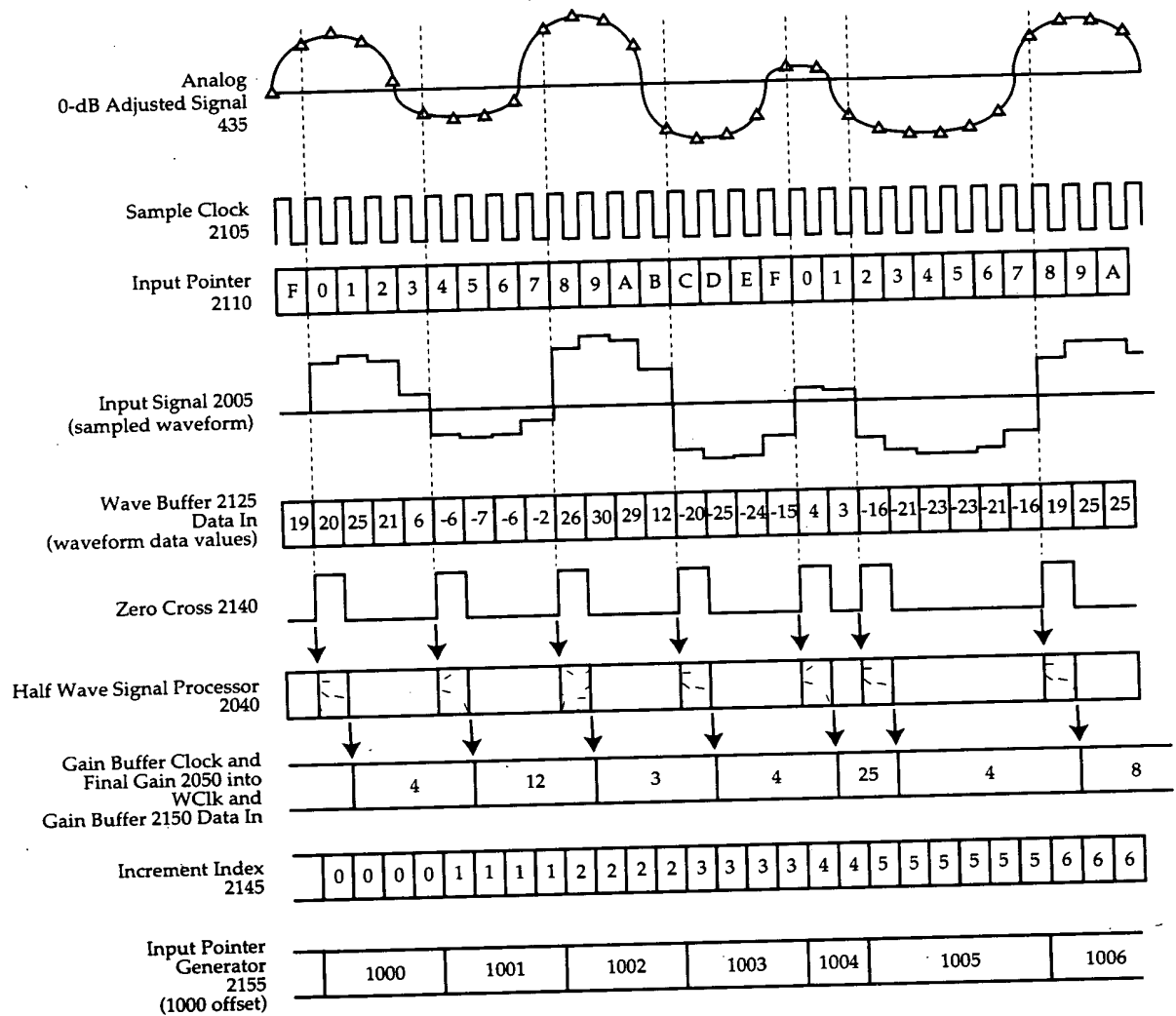


FIG. 21B

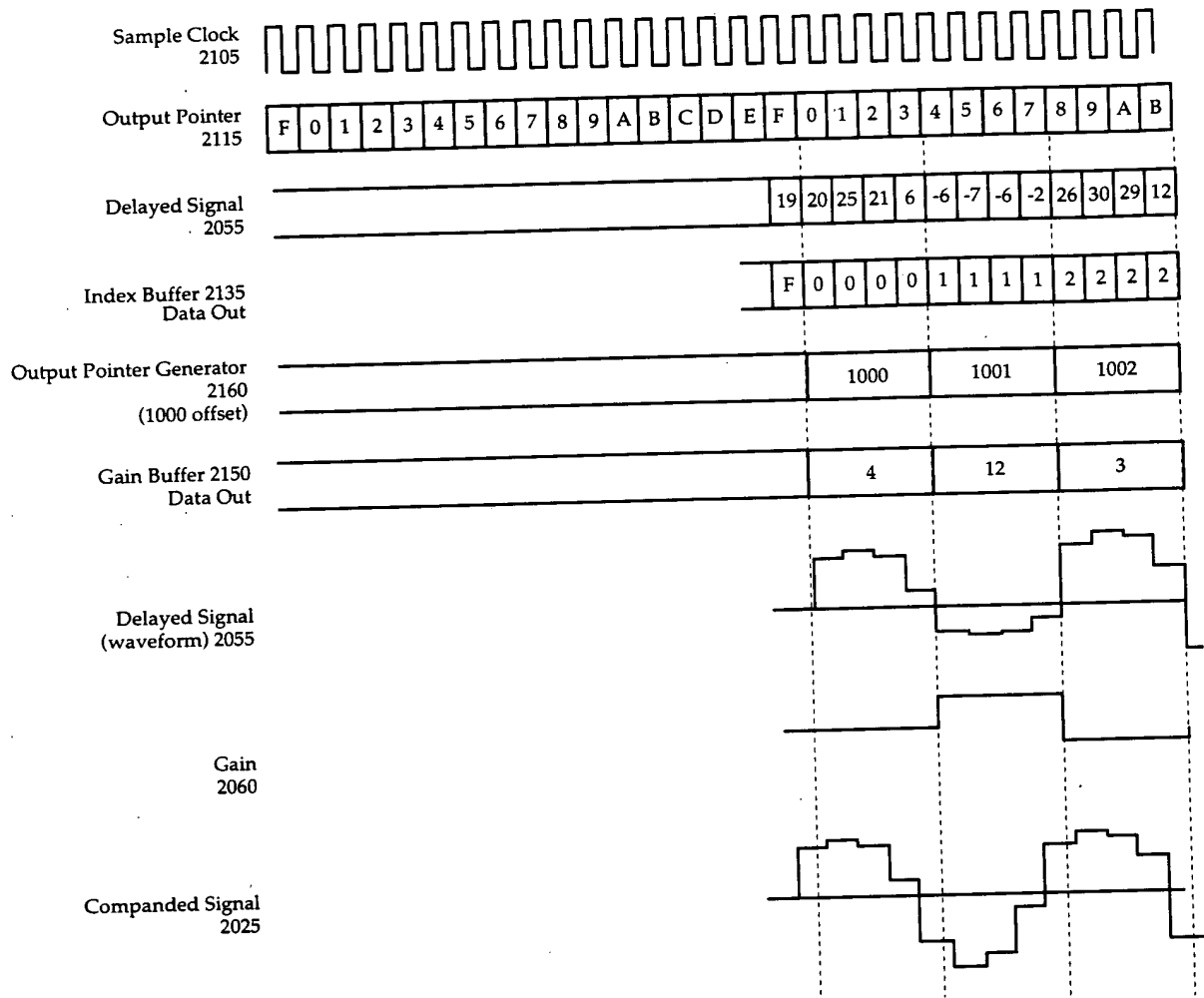


FIG. 21C

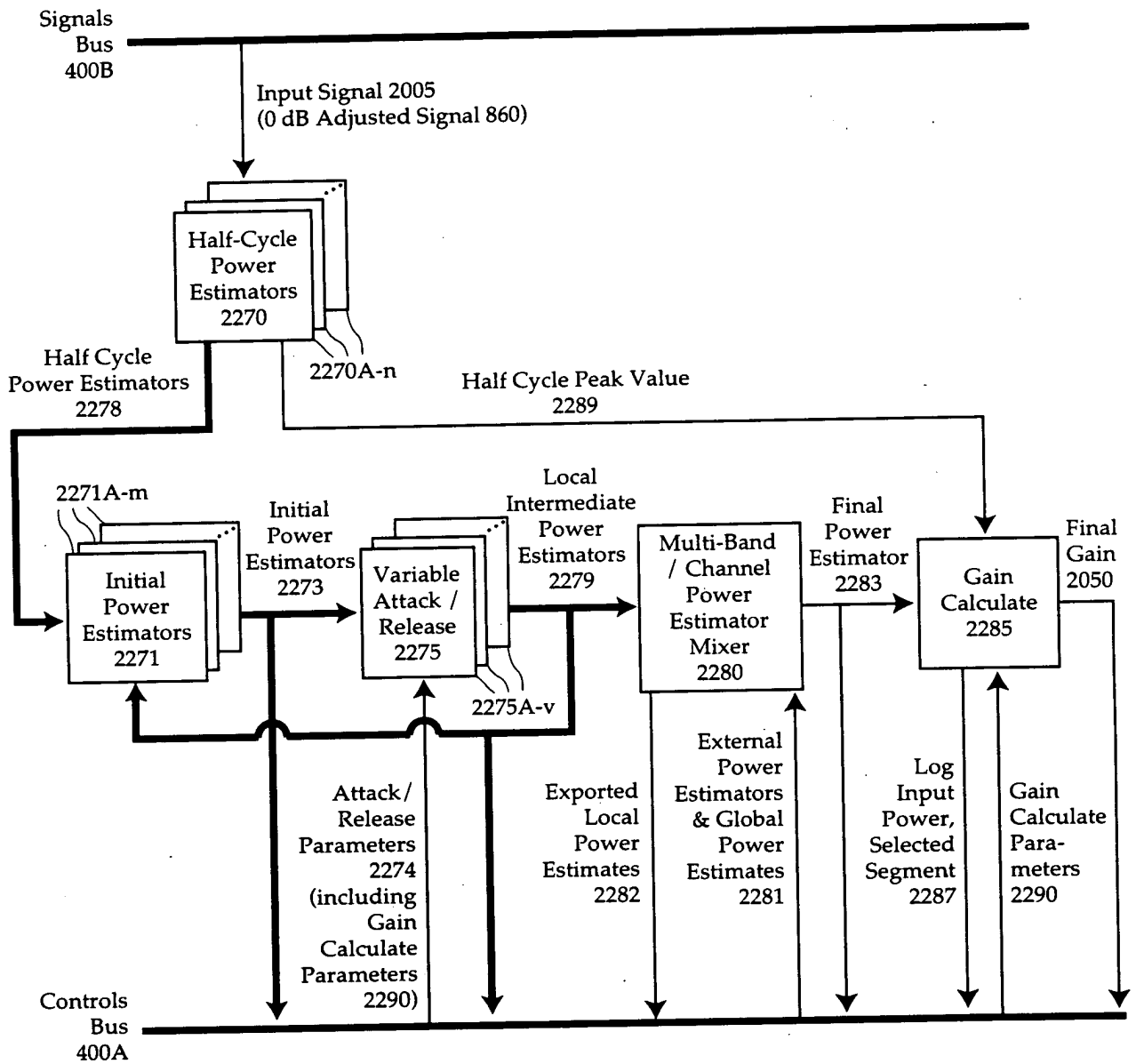


FIG. 22

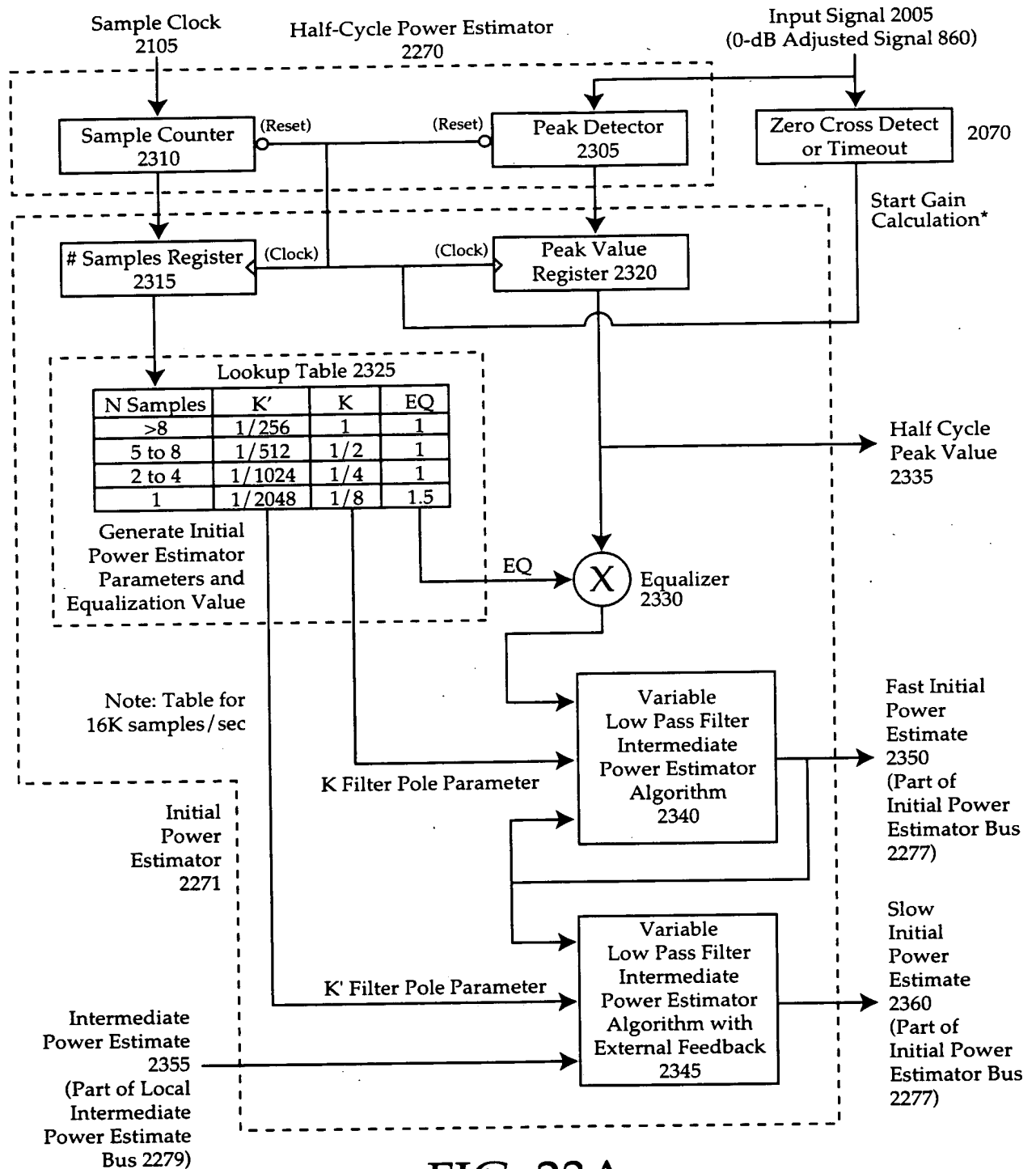


FIG. 23A

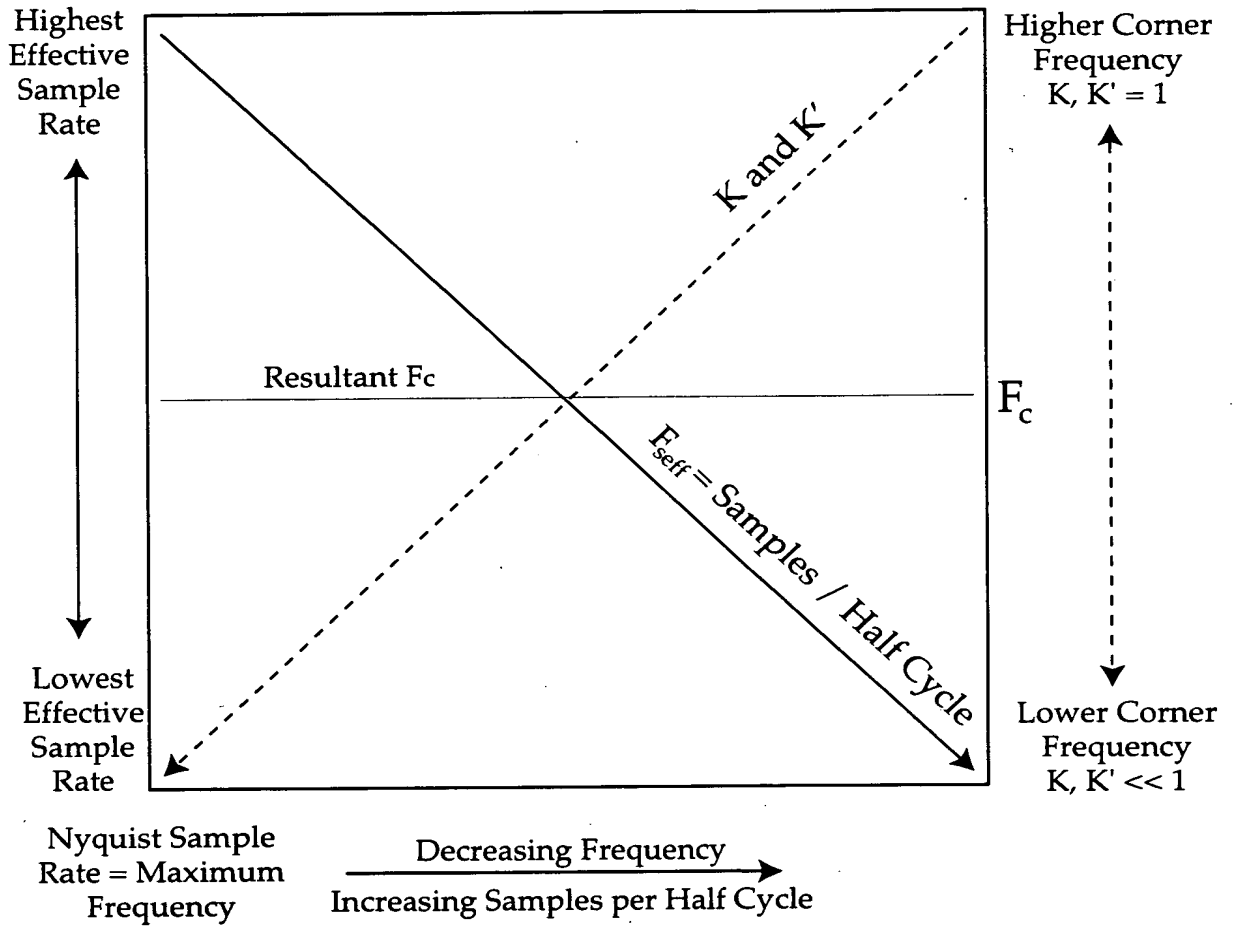


FIG. 23B

50 / 152

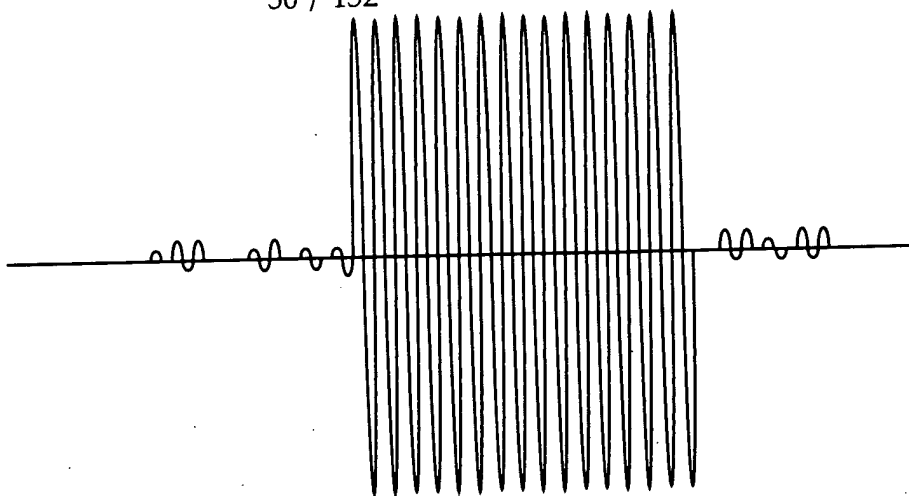


FIG. 23C

Figure	Figure Description	Figure Title
Figure 1	Flowchart of the study design and participant flow.	Study Design and Participant Flow
Figure 2	Bar chart showing the distribution of participants by age group.	Participant Distribution by Age Group
Figure 3	Bar chart showing the distribution of participants by gender.	Participant Distribution by Gender
Figure 4	Bar chart showing the distribution of participants by education level.	Participant Distribution by Education Level
Figure 5	Bar chart showing the distribution of participants by occupation.	Participant Distribution by Occupation
Figure 6	Bar chart showing the distribution of participants by marital status.	Participant Distribution by Marital Status
Figure 7	Bar chart showing the distribution of participants by income level.	Participant Distribution by Income Level
Figure 8	Bar chart showing the distribution of participants by health status.	Participant Distribution by Health Status
Figure 9	Bar chart showing the distribution of participants by social support.	Participant Distribution by Social Support
Figure 10	Bar chart showing the distribution of participants by coping strategies.	Participant Distribution by Coping Strategies
Figure 11	Bar chart showing the distribution of participants by life satisfaction.	Participant Distribution by Life Satisfaction
Figure 12	Bar chart showing the distribution of participants by psychological well-being.	Participant Distribution by Psychological Well-being
Figure 13	Bar chart showing the distribution of participants by physical well-being.	Participant Distribution by Physical Well-being
Figure 14	Bar chart showing the distribution of participants by overall quality of life.	Participant Distribution by Overall Quality of Life

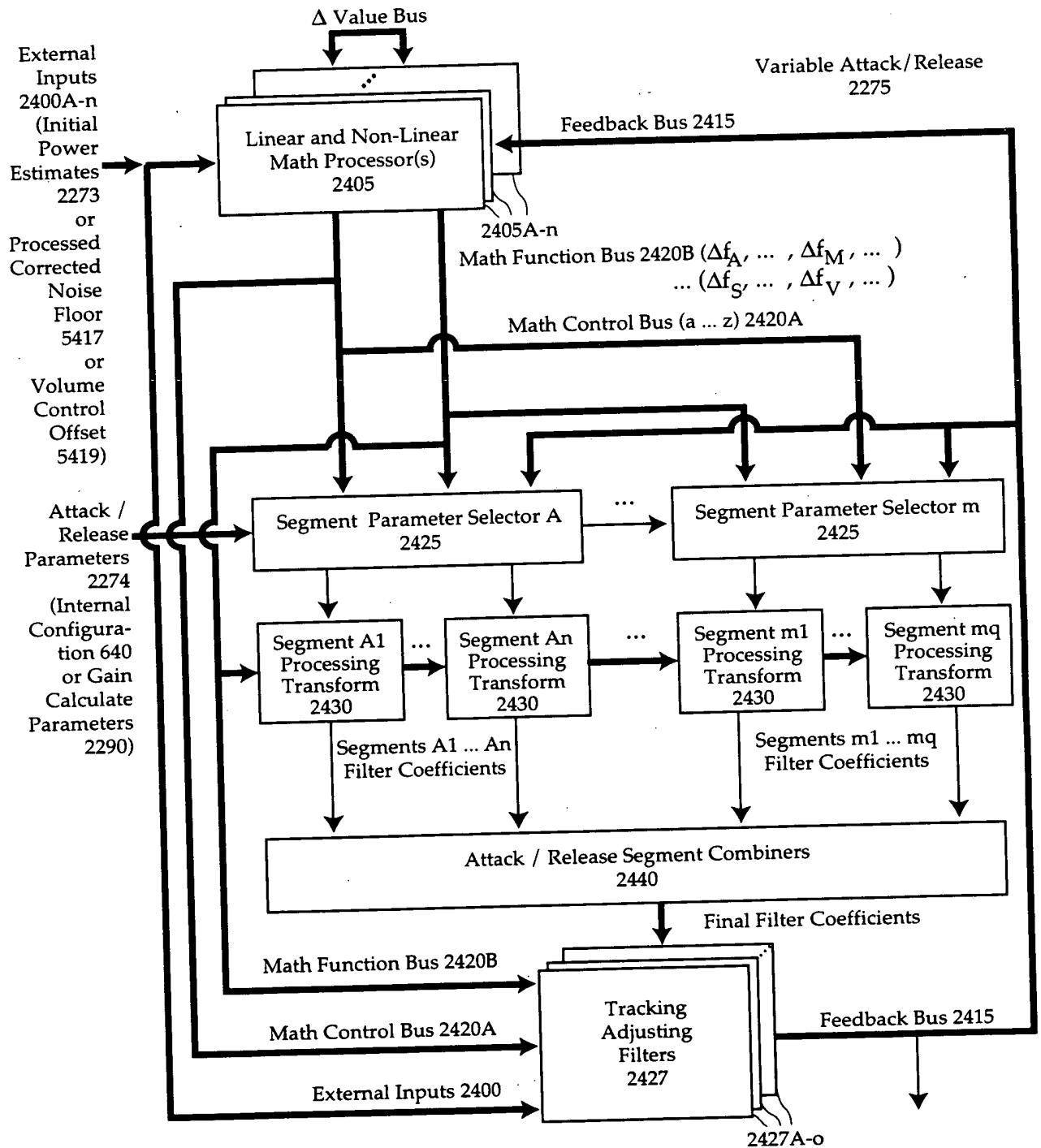


FIG. 24A

Local Intermediate Power Estimates 2279
or Long Duration Noise Floor 5425
or Long Duration Noise Offset 5427

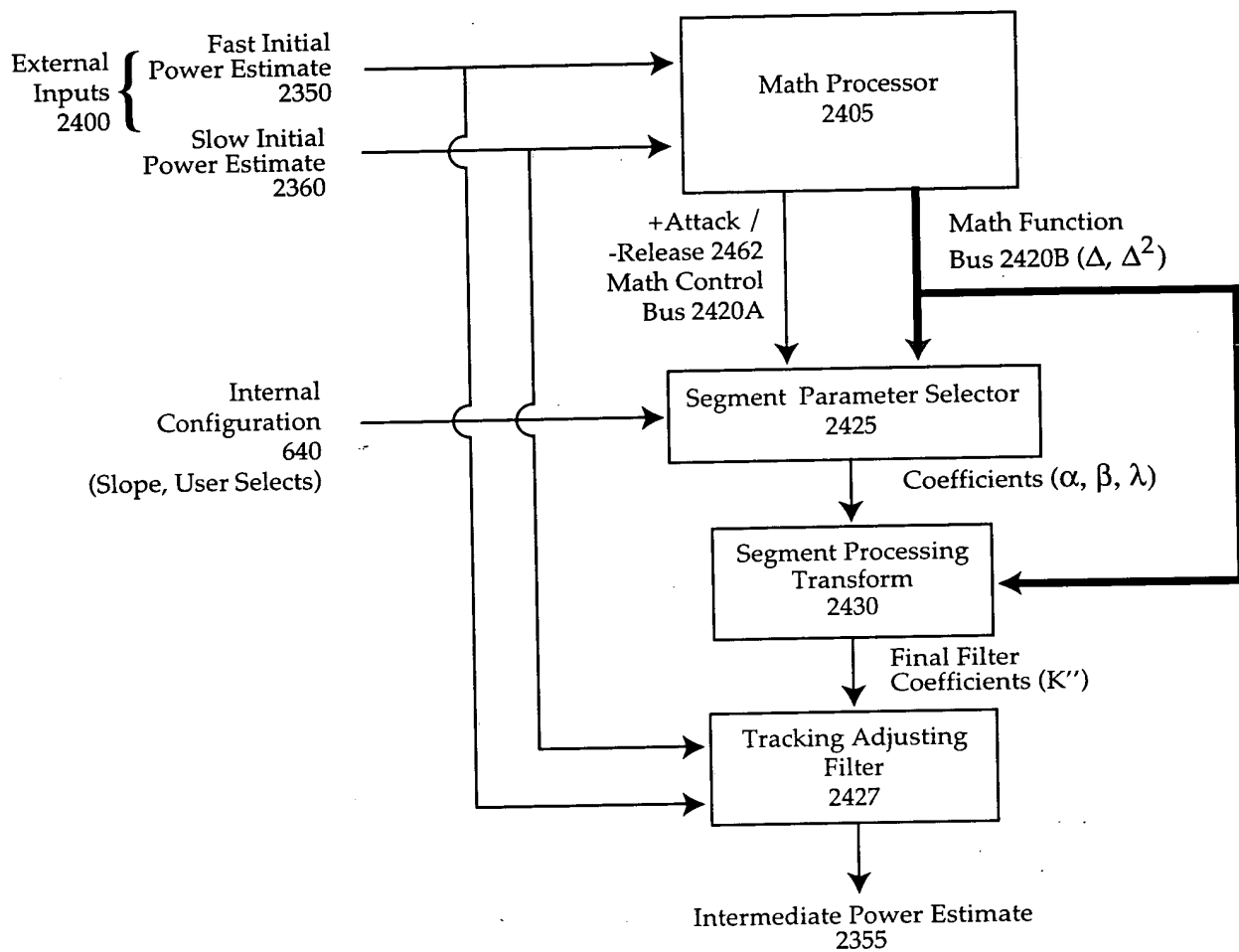


FIG. 24B

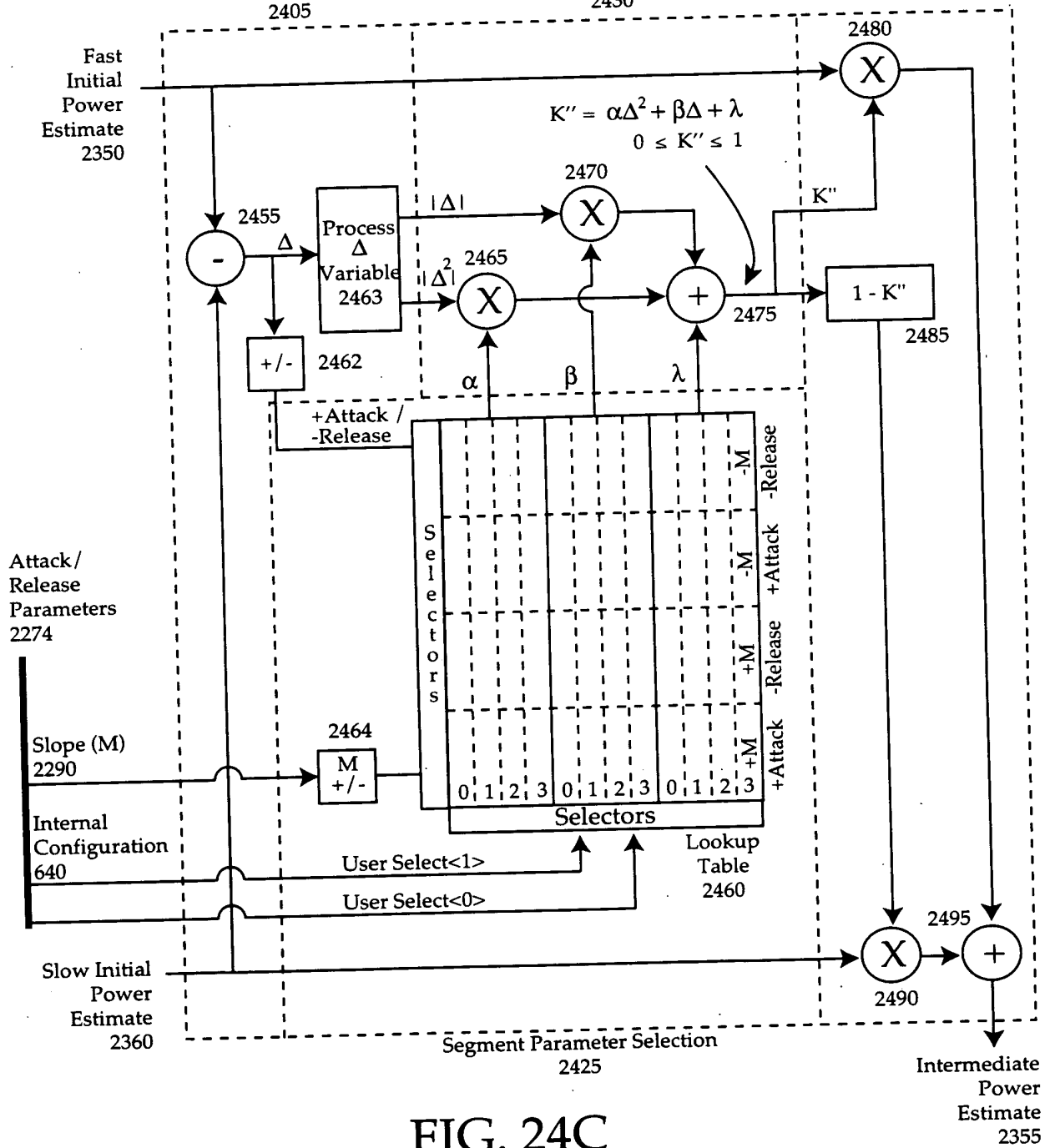


FIG. 24C

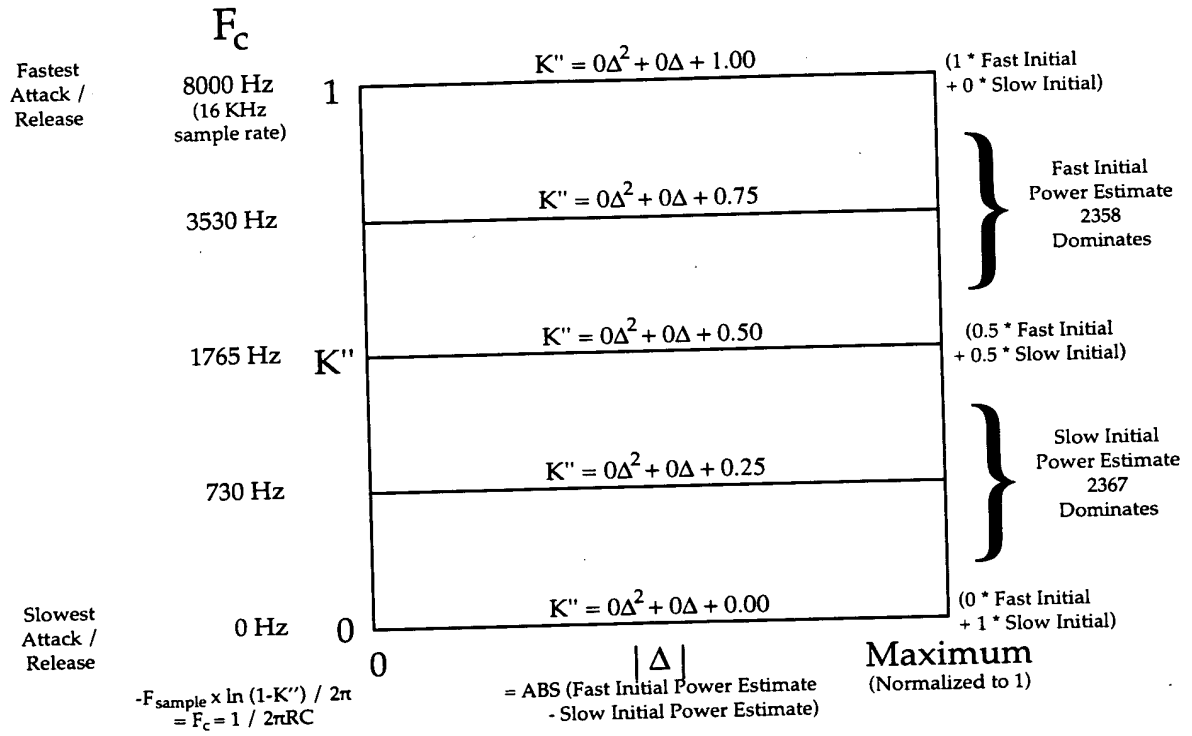
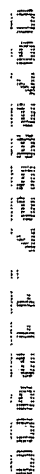


FIG. 24D



1

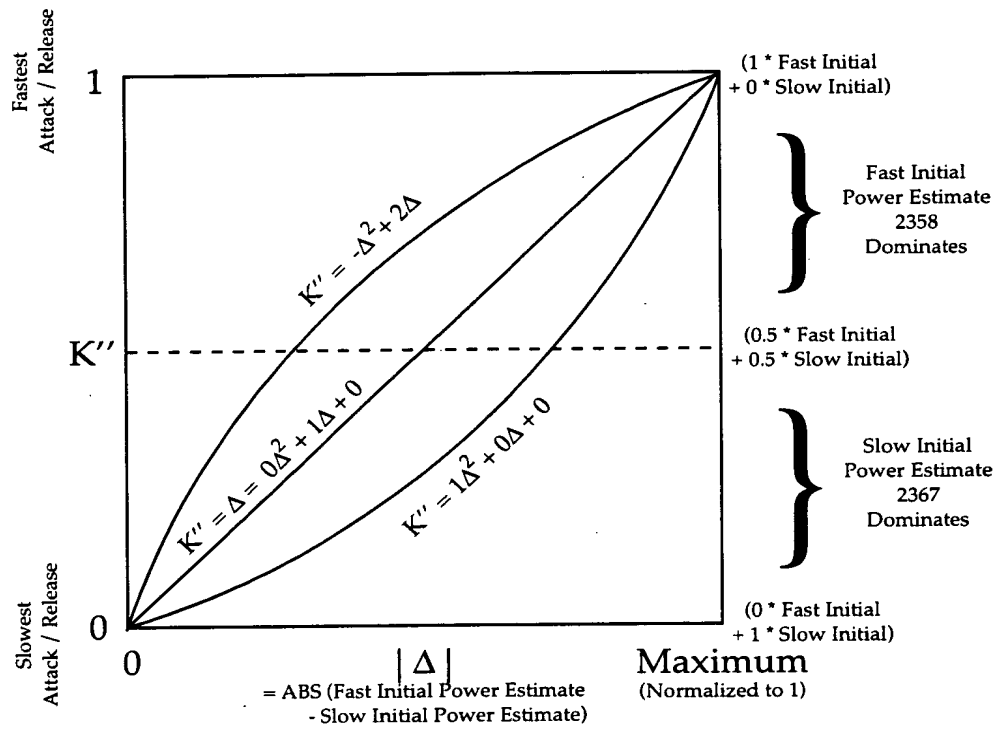


FIG. 24F

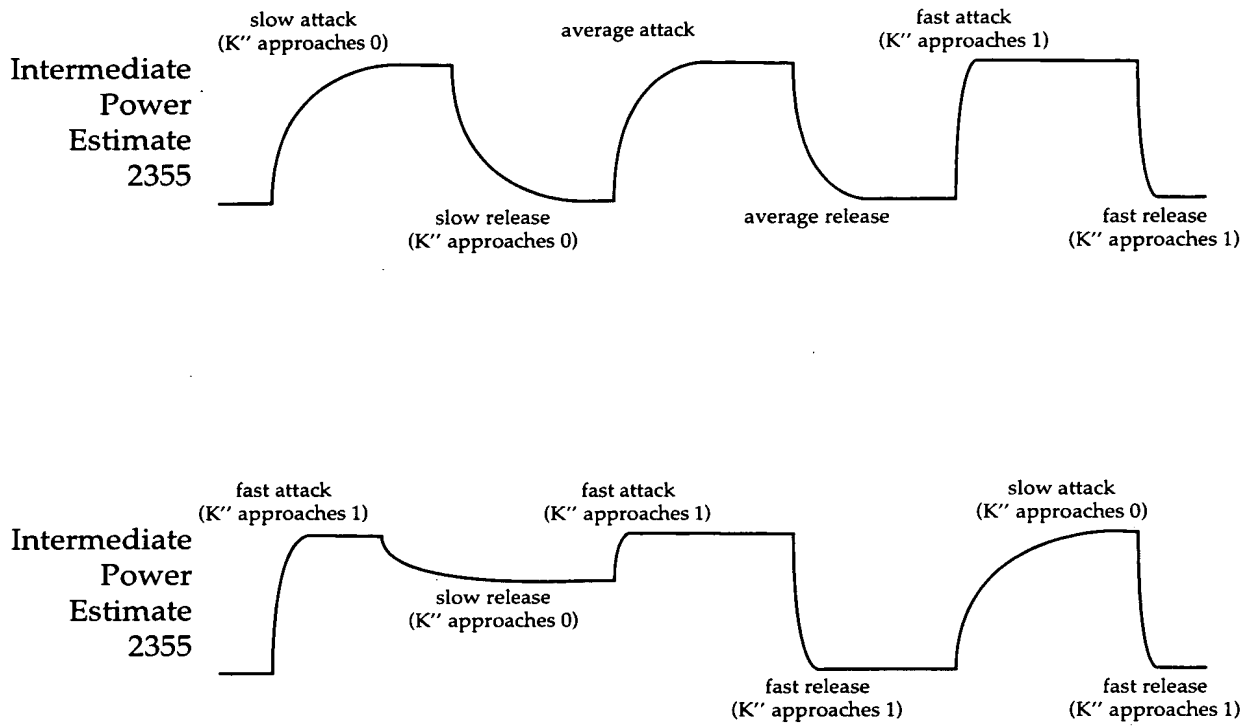


FIG. 24G

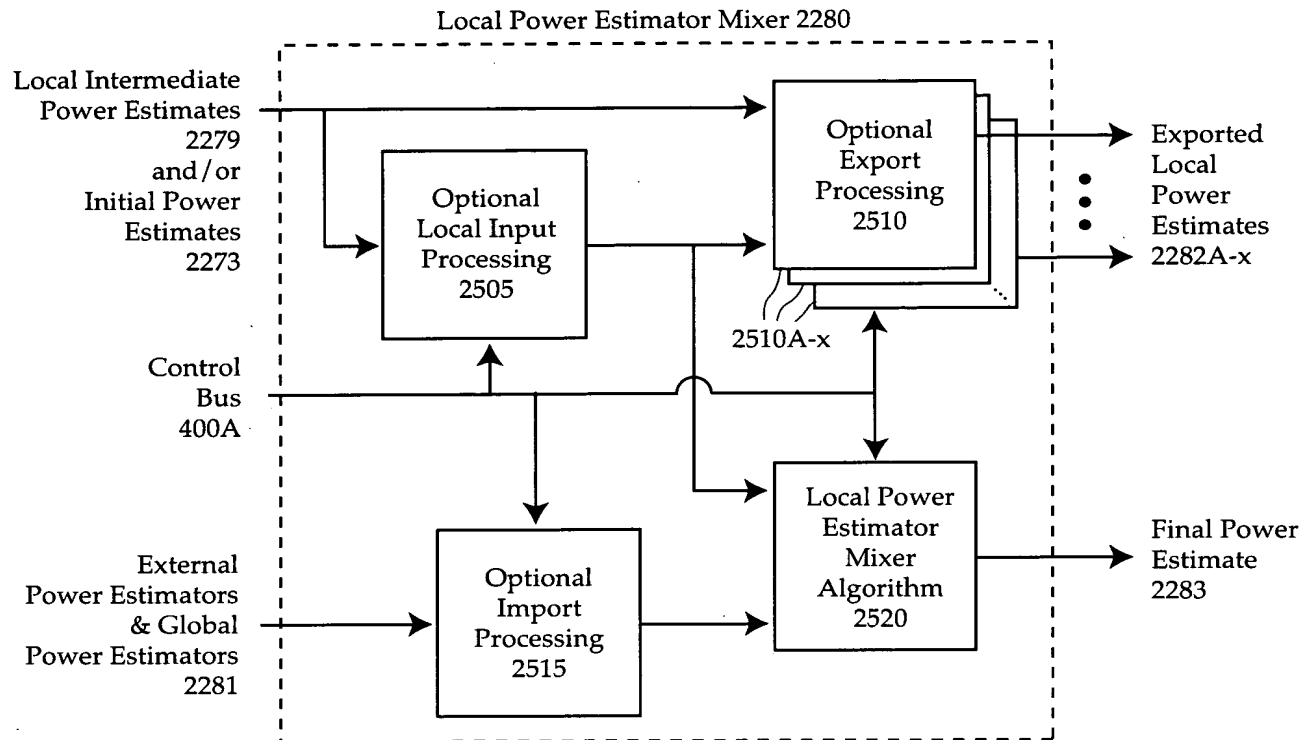


FIG. 25A

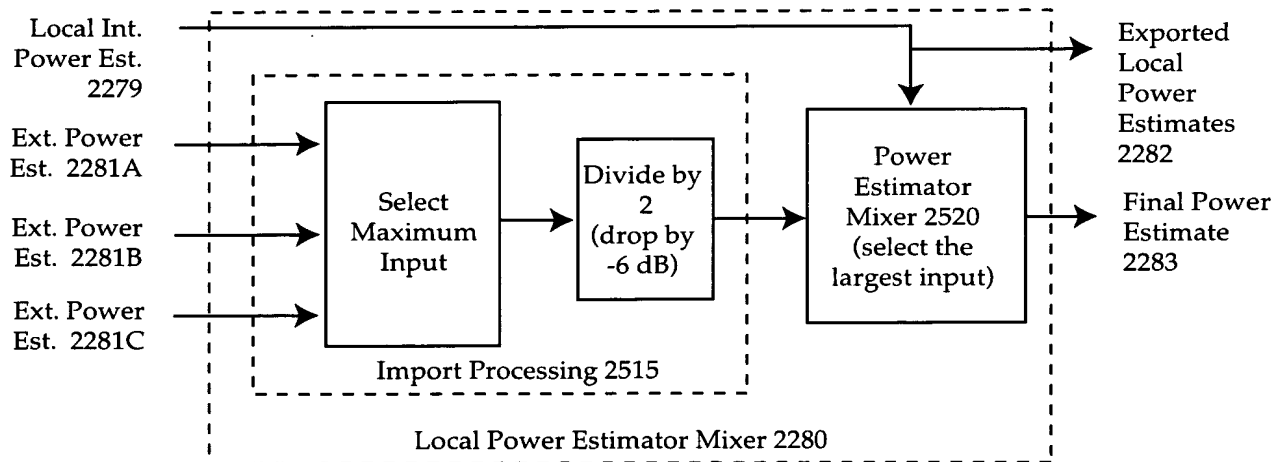


FIG. 25B

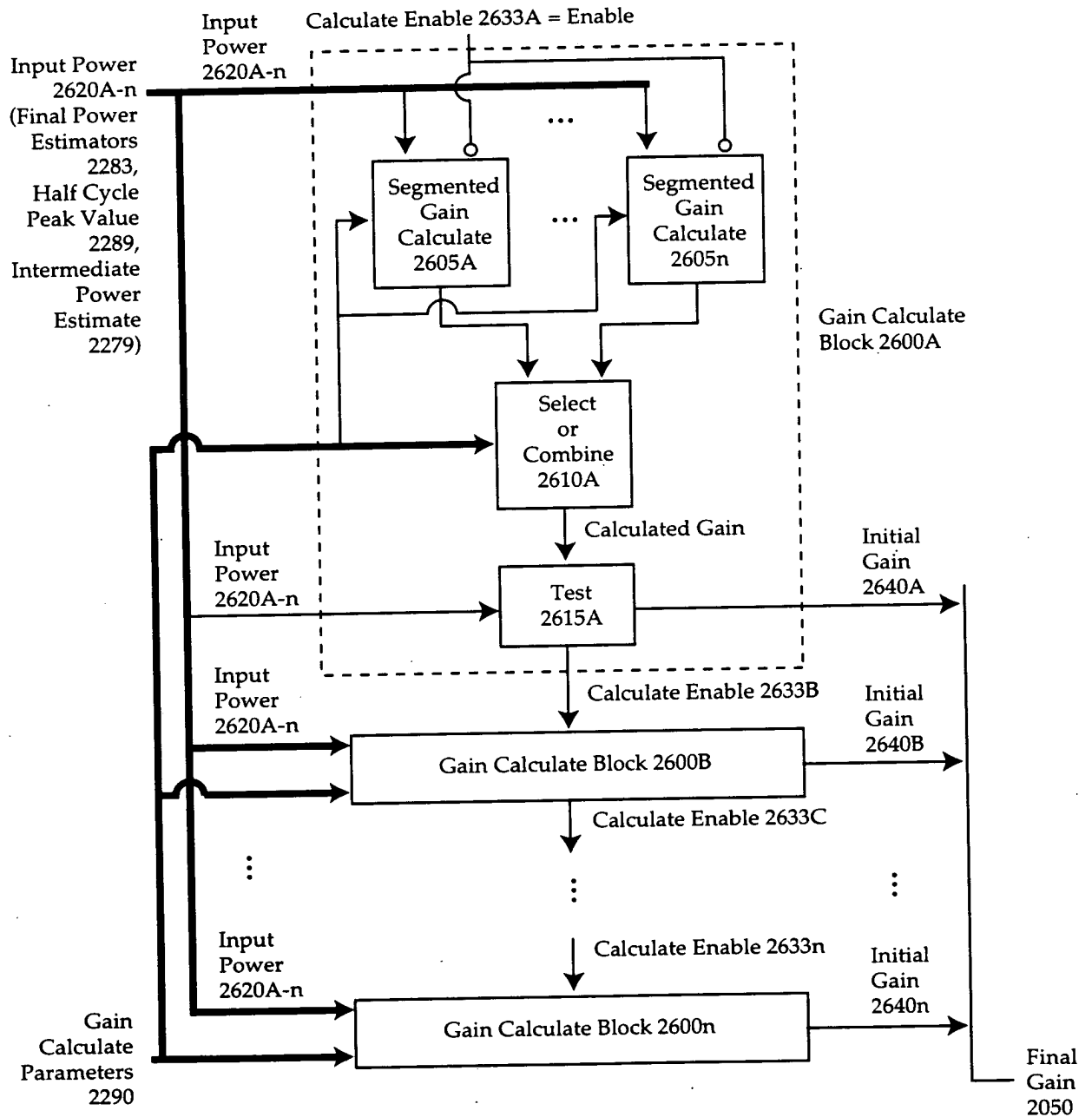


FIG. 26A

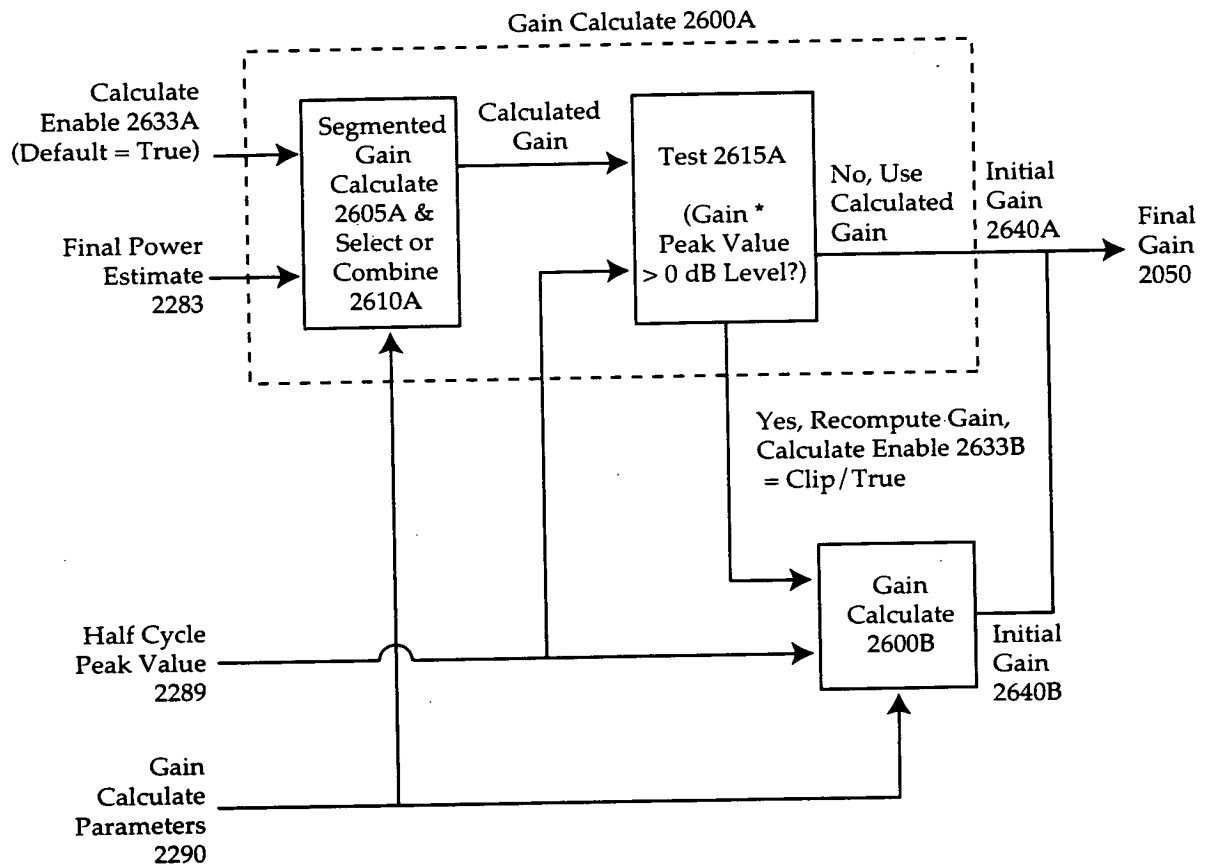


FIG. 26B

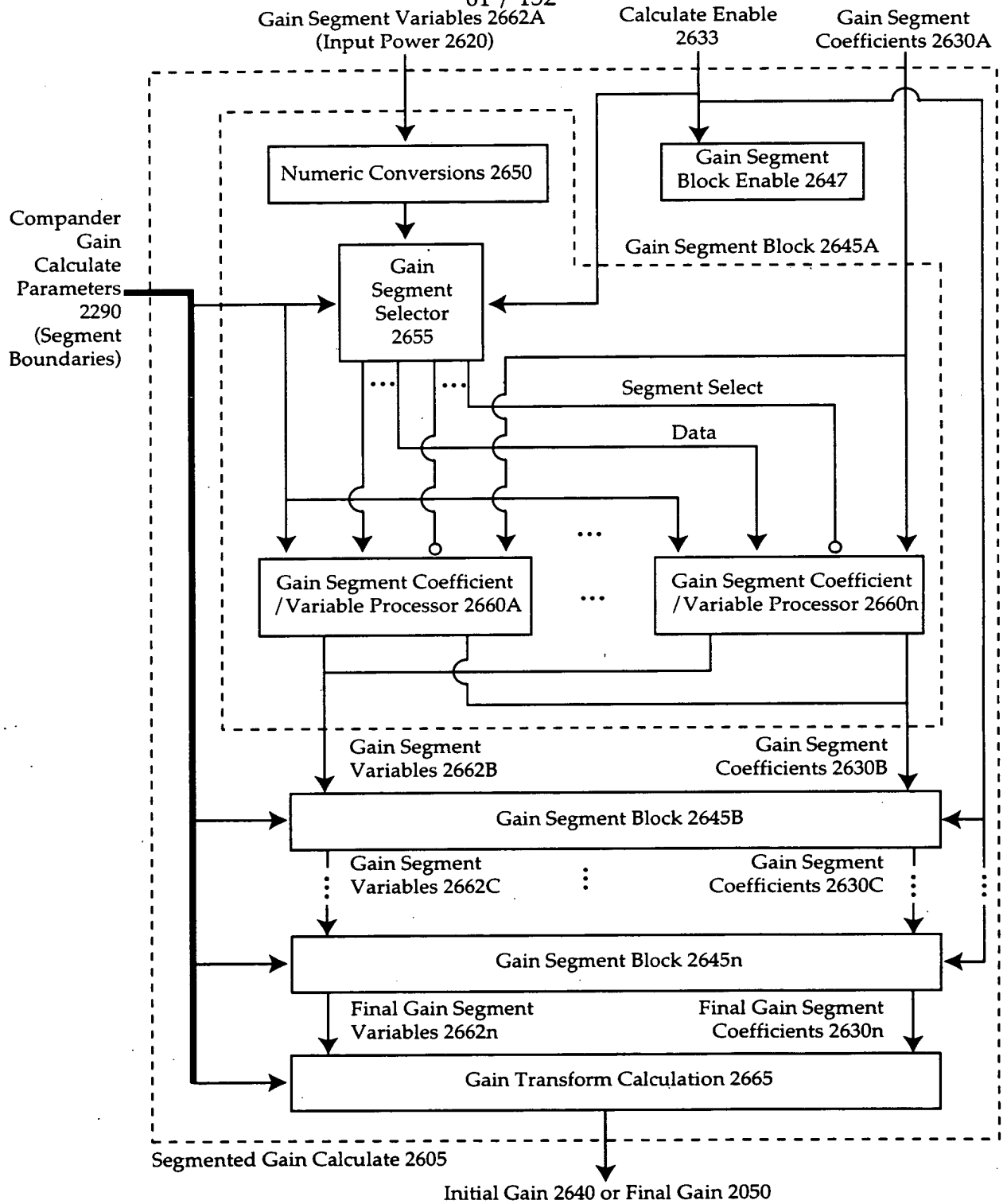


FIG. 26C

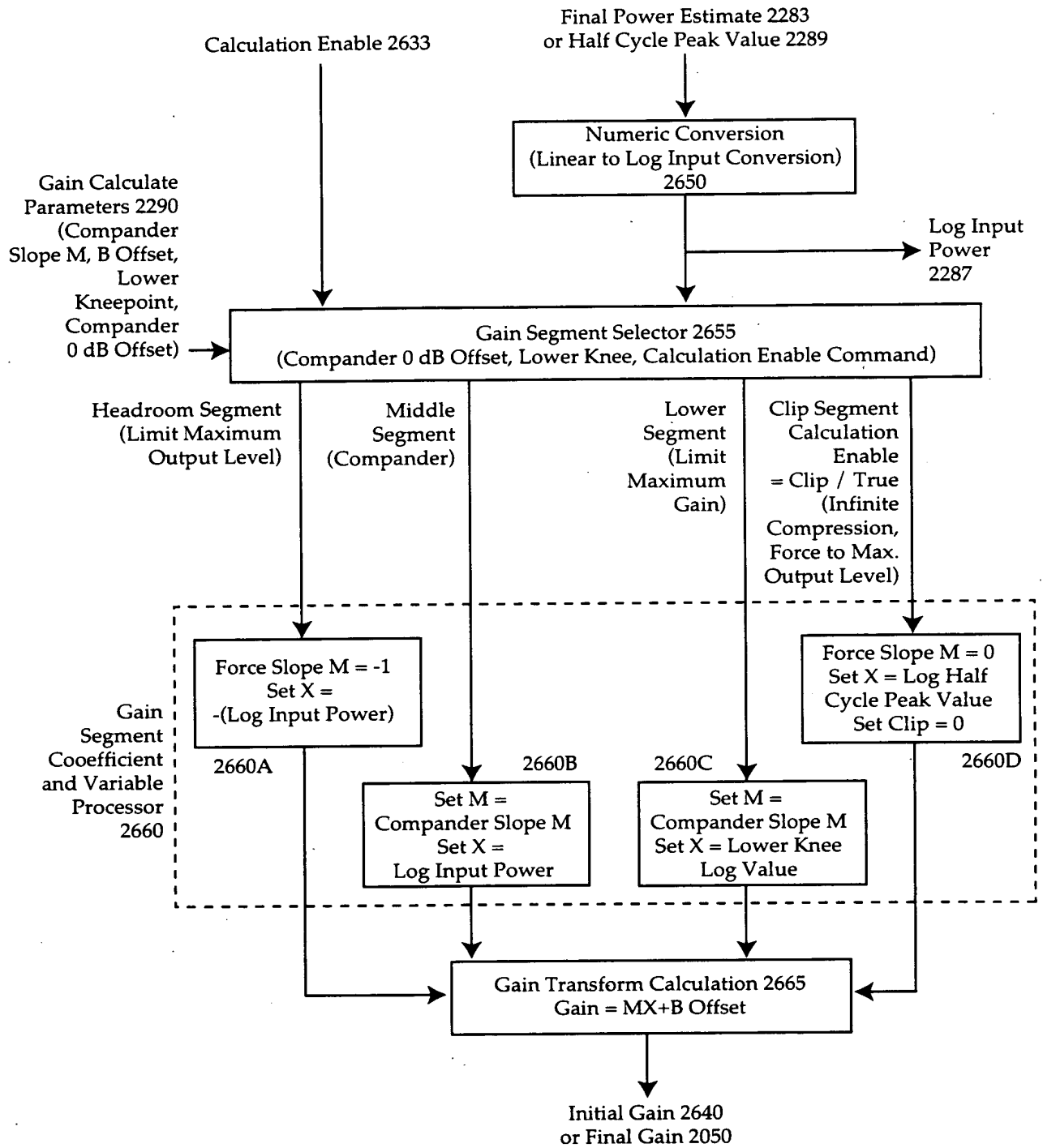


FIG. 26D

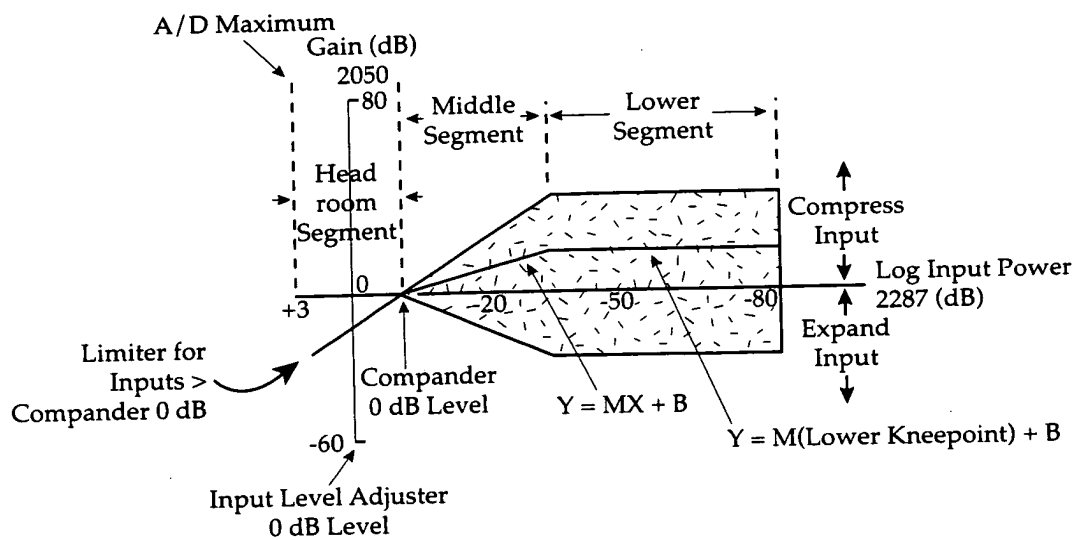


FIG. 26E

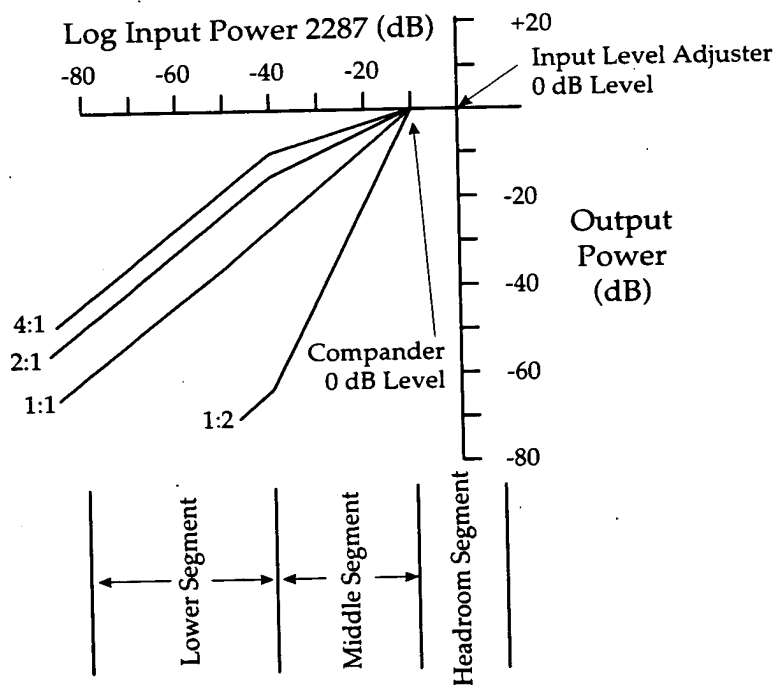


FIG. 26F

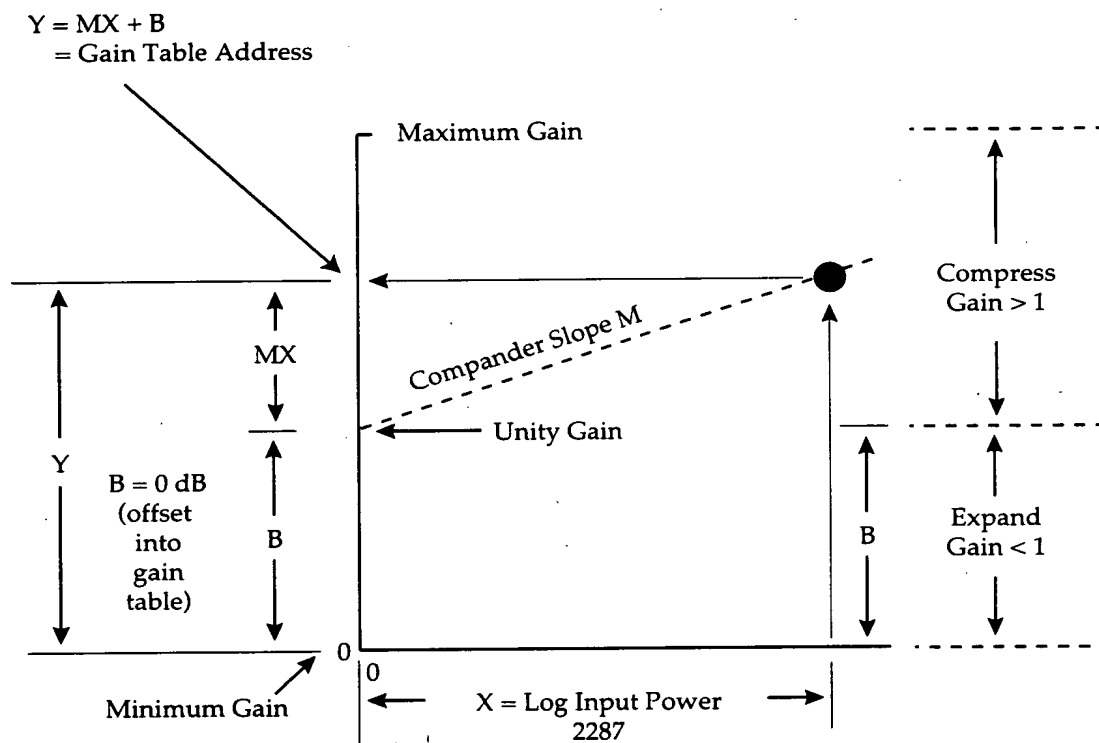


FIG. 26G

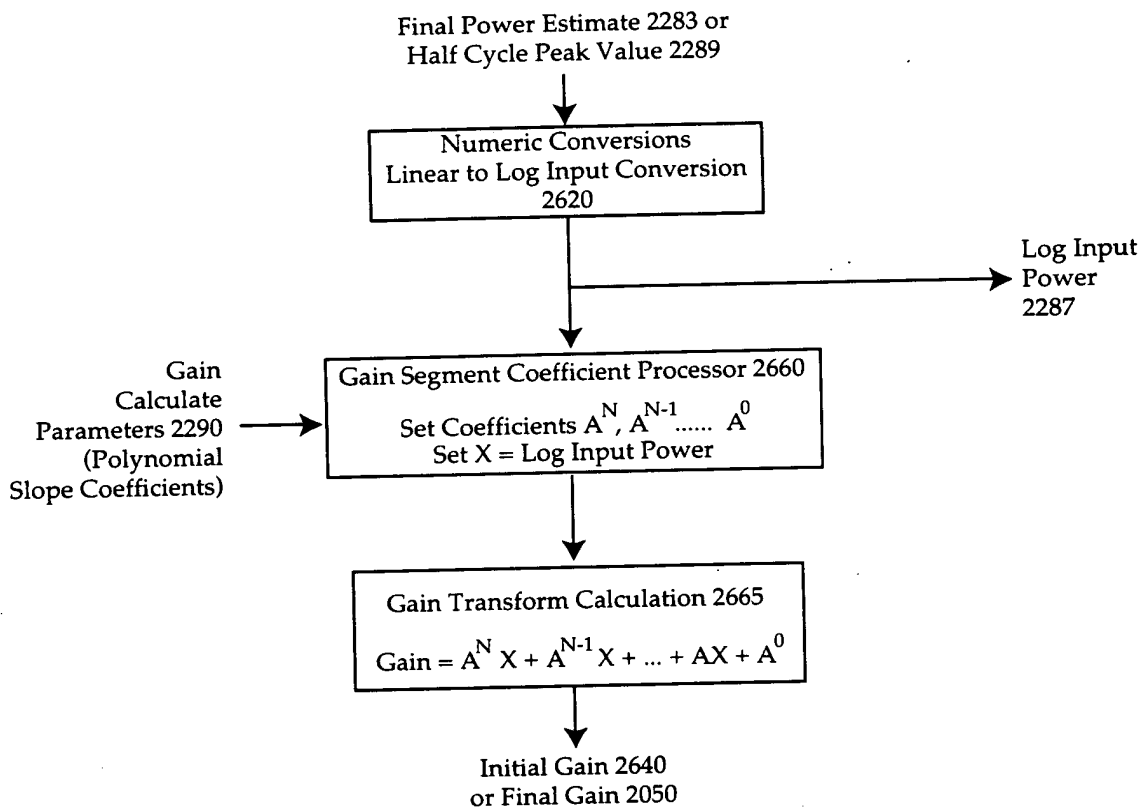


FIG. 26H

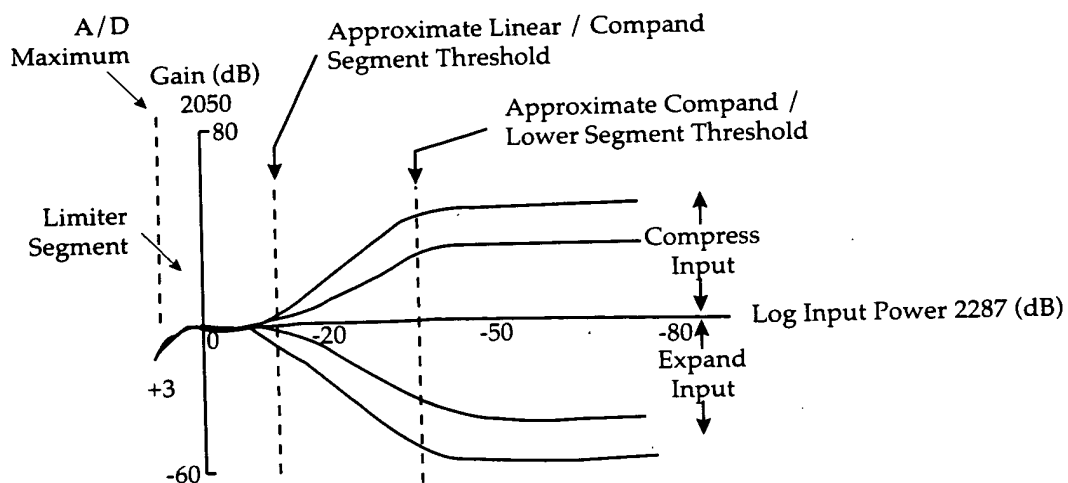


FIG. 26I

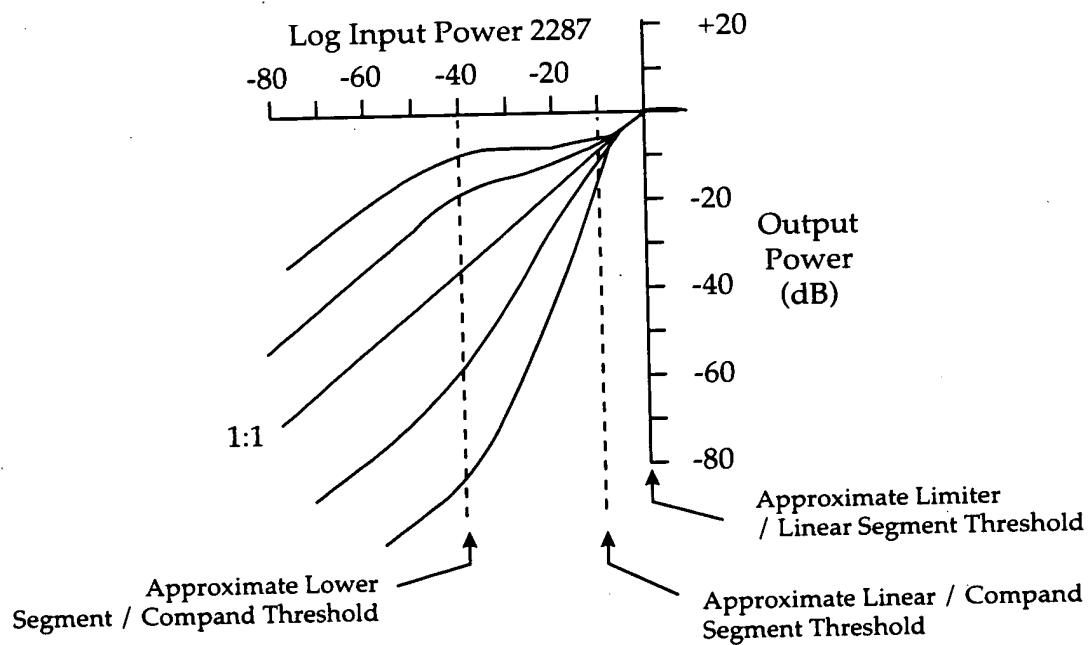


FIG. 26J

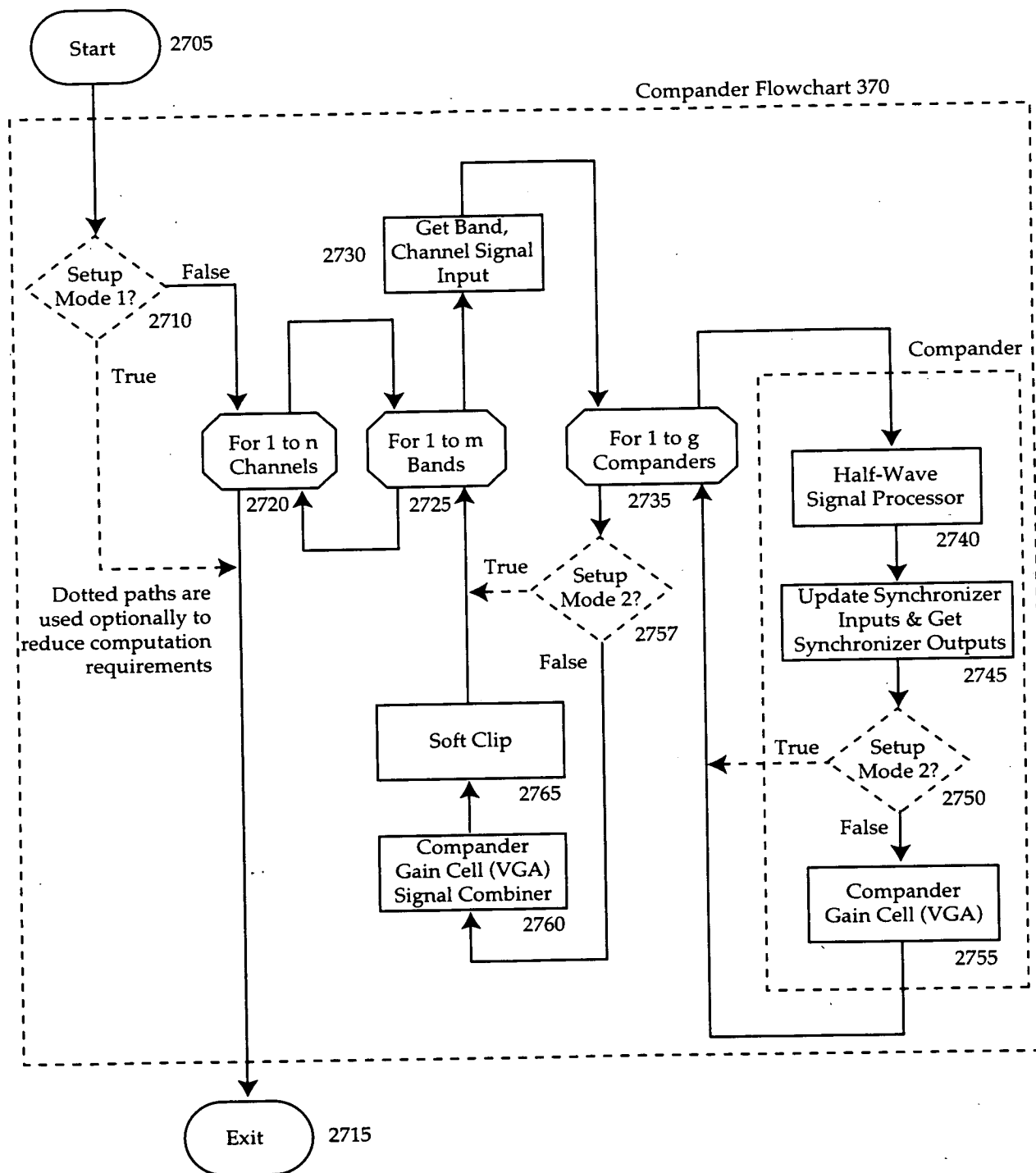


FIG. 27A

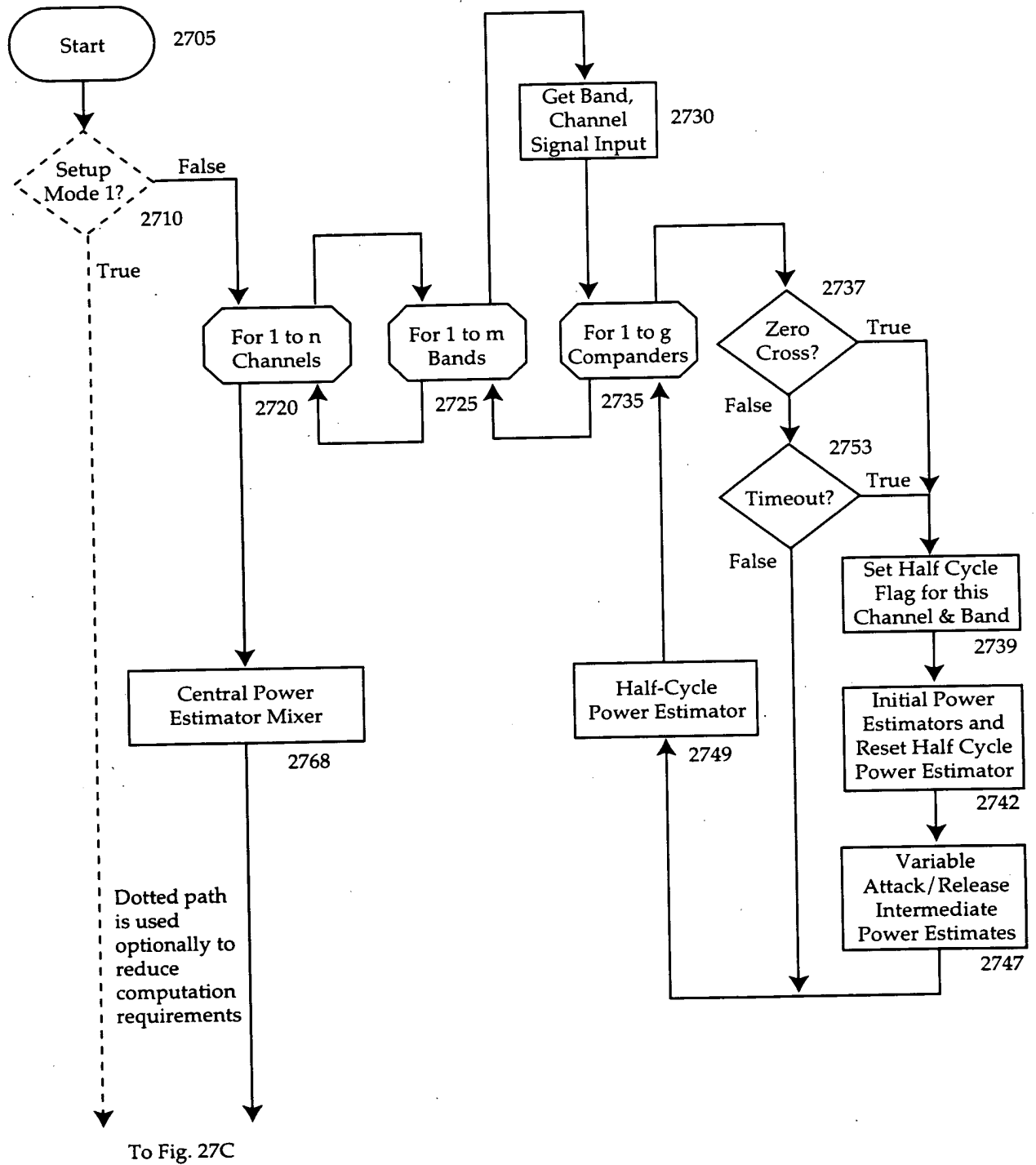


FIG. 27B

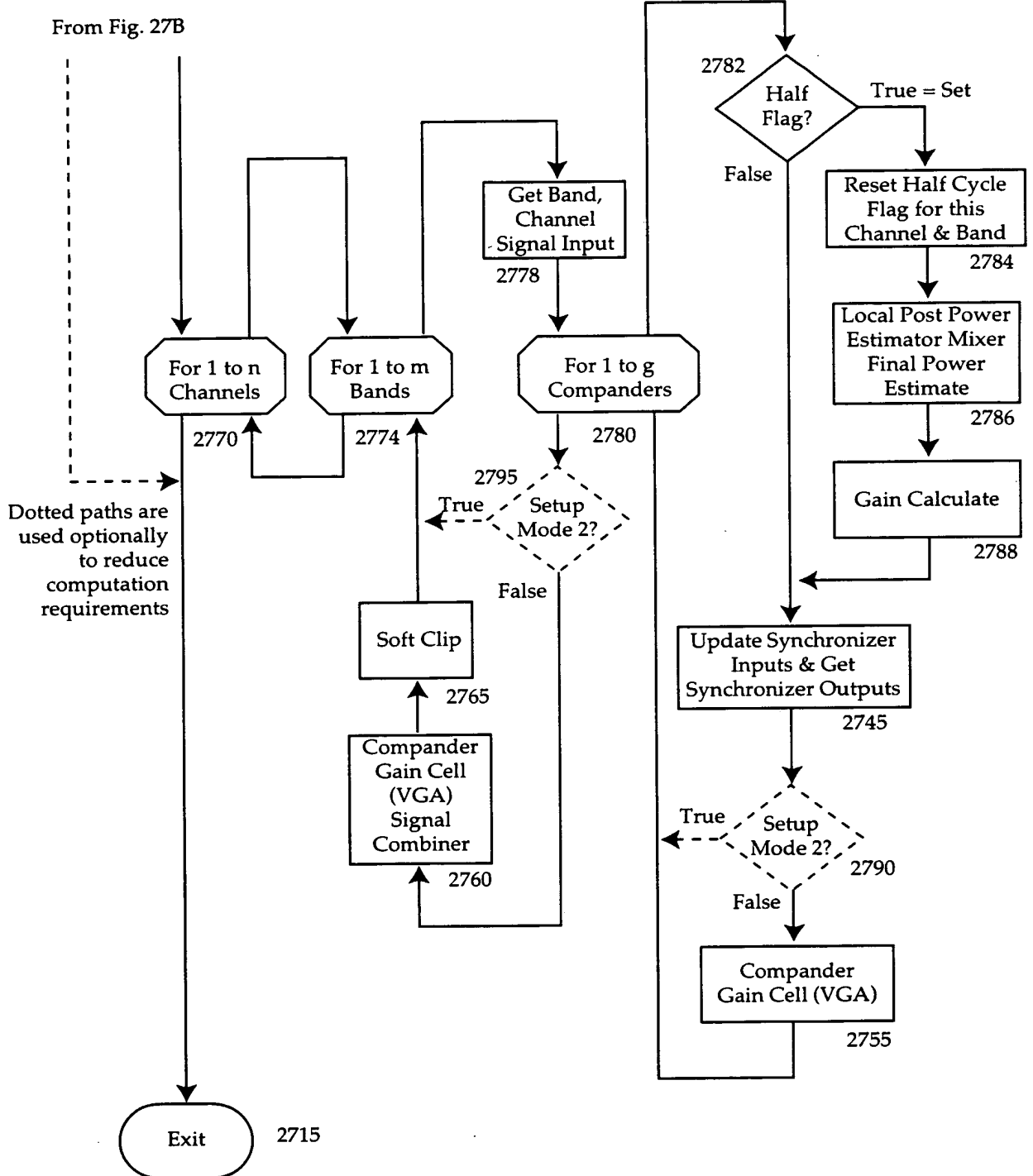


FIG. 27C

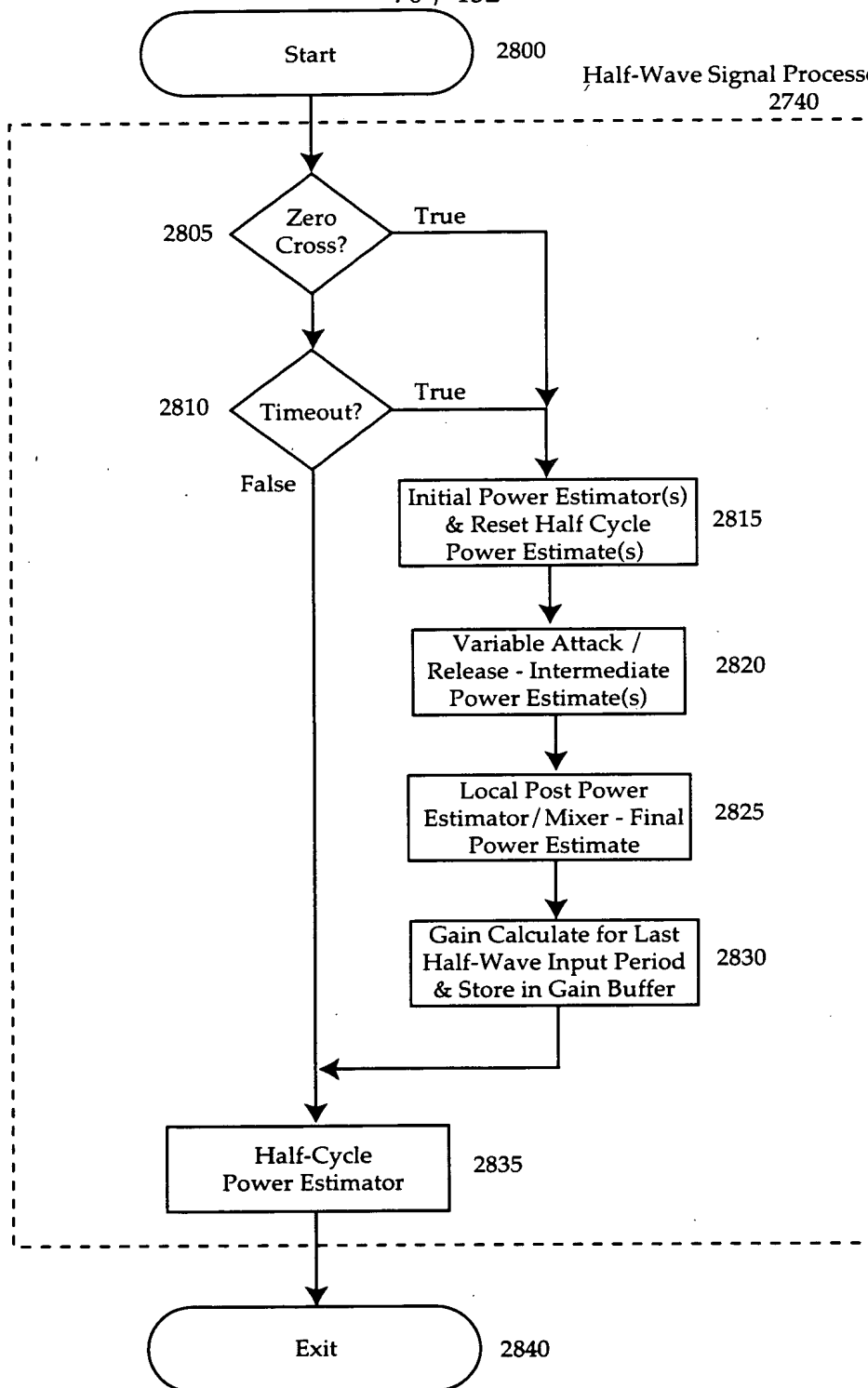


FIG. 28

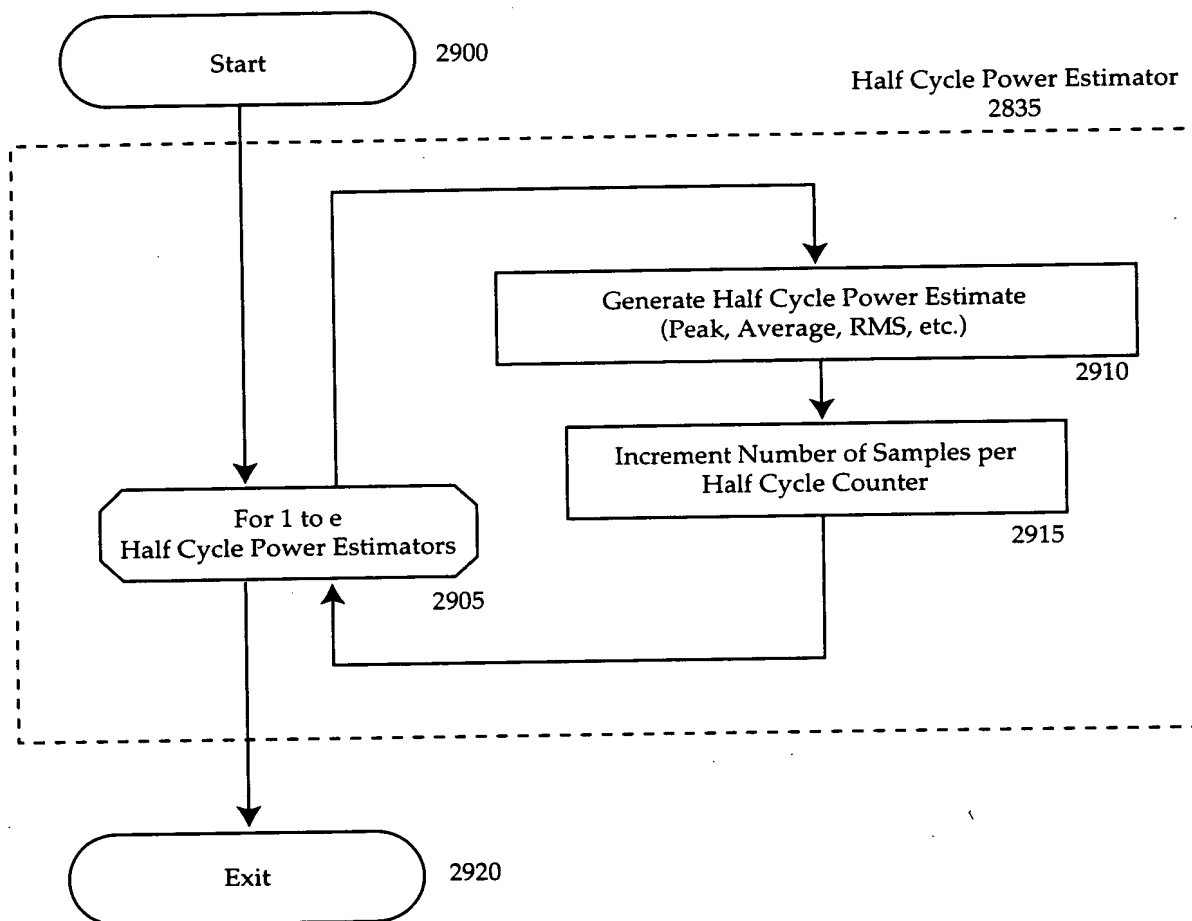


FIG. 29

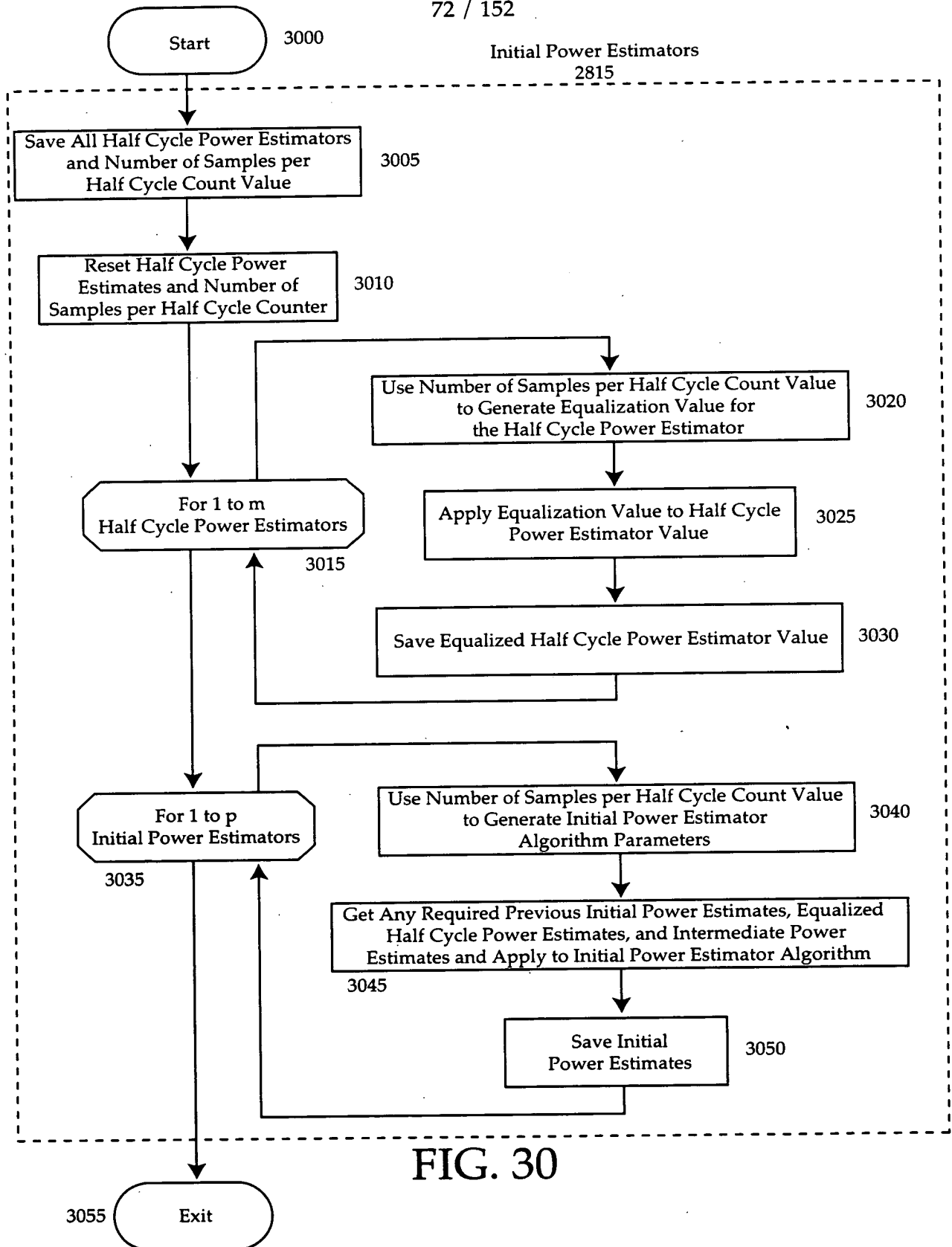
Initial Power Estimators
2815

FIG. 30

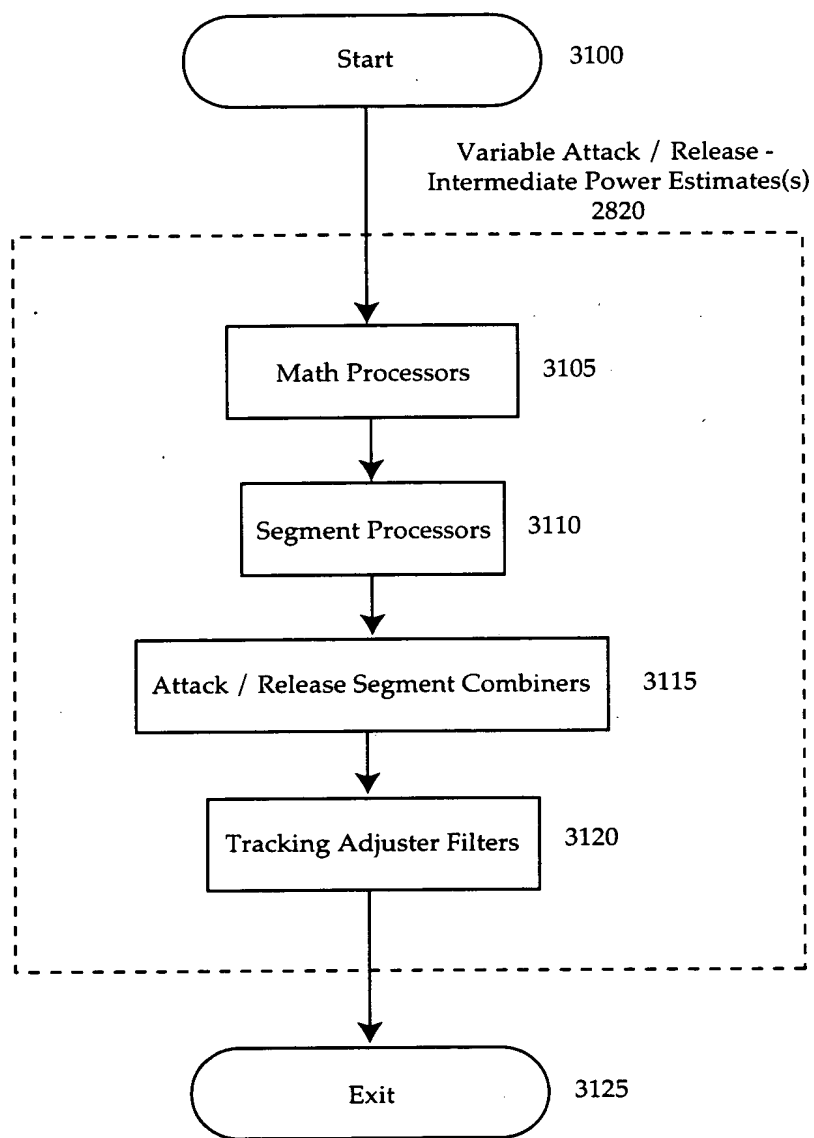


FIG. 31

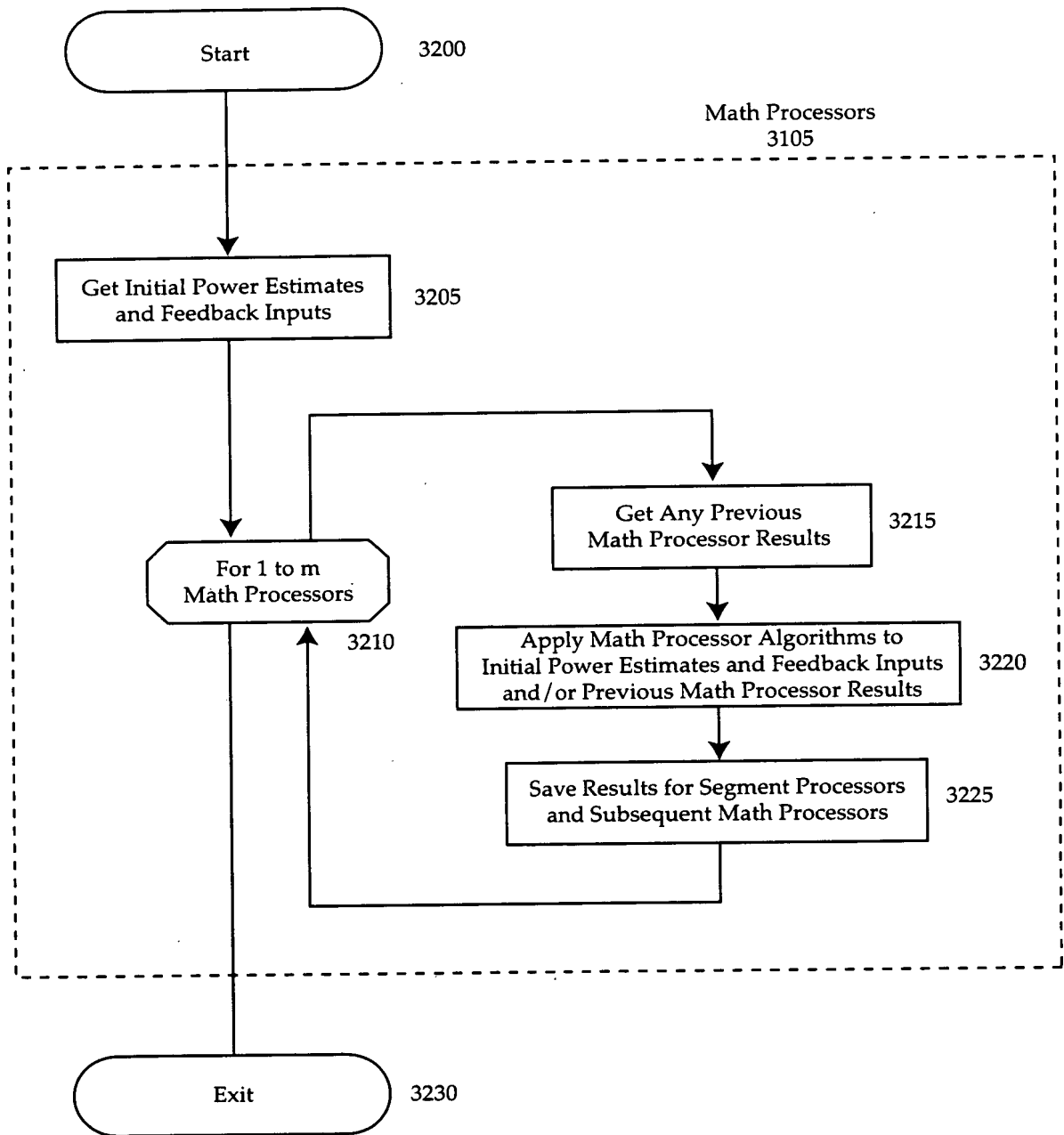


FIG. 32

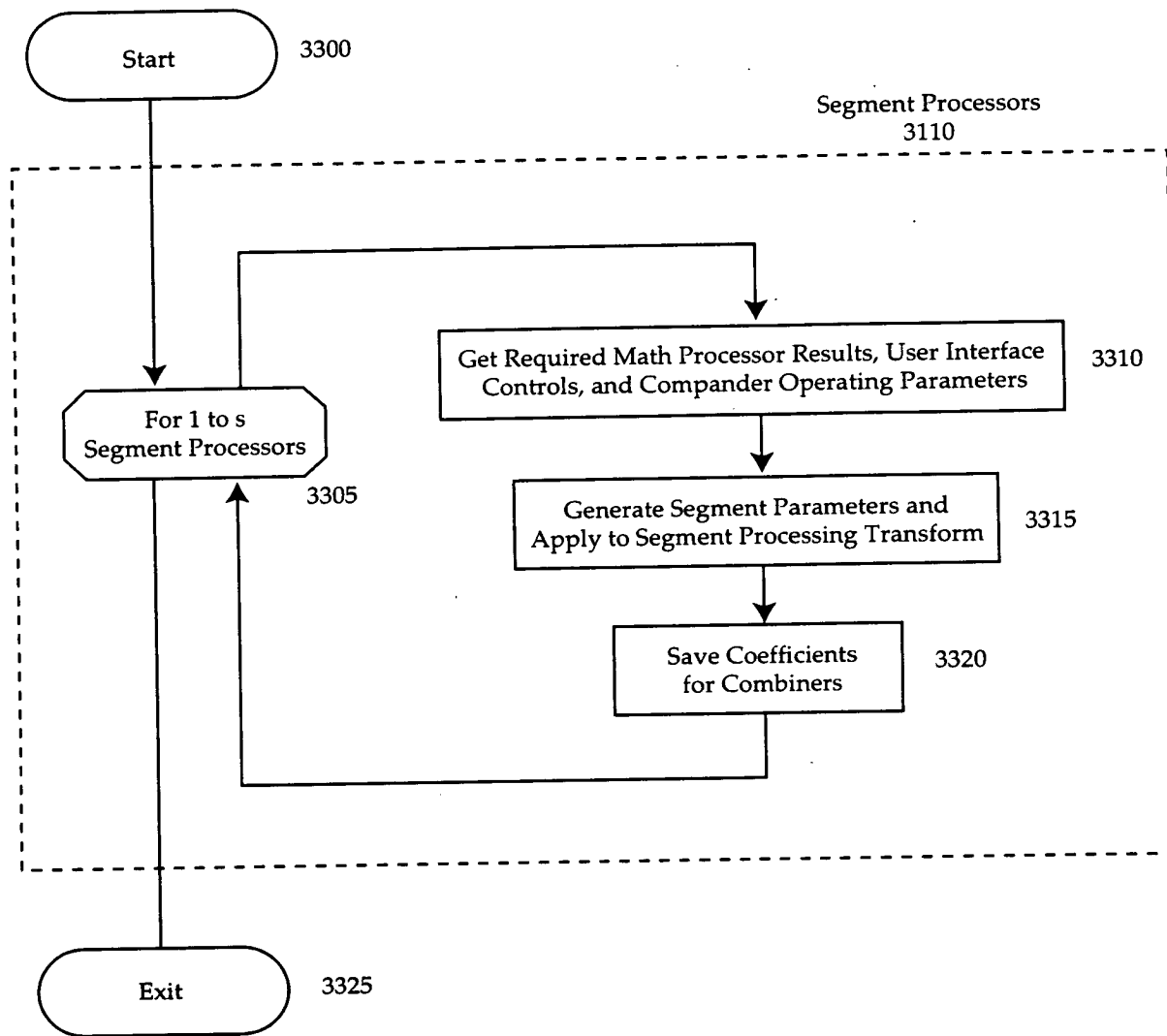


FIG. 33

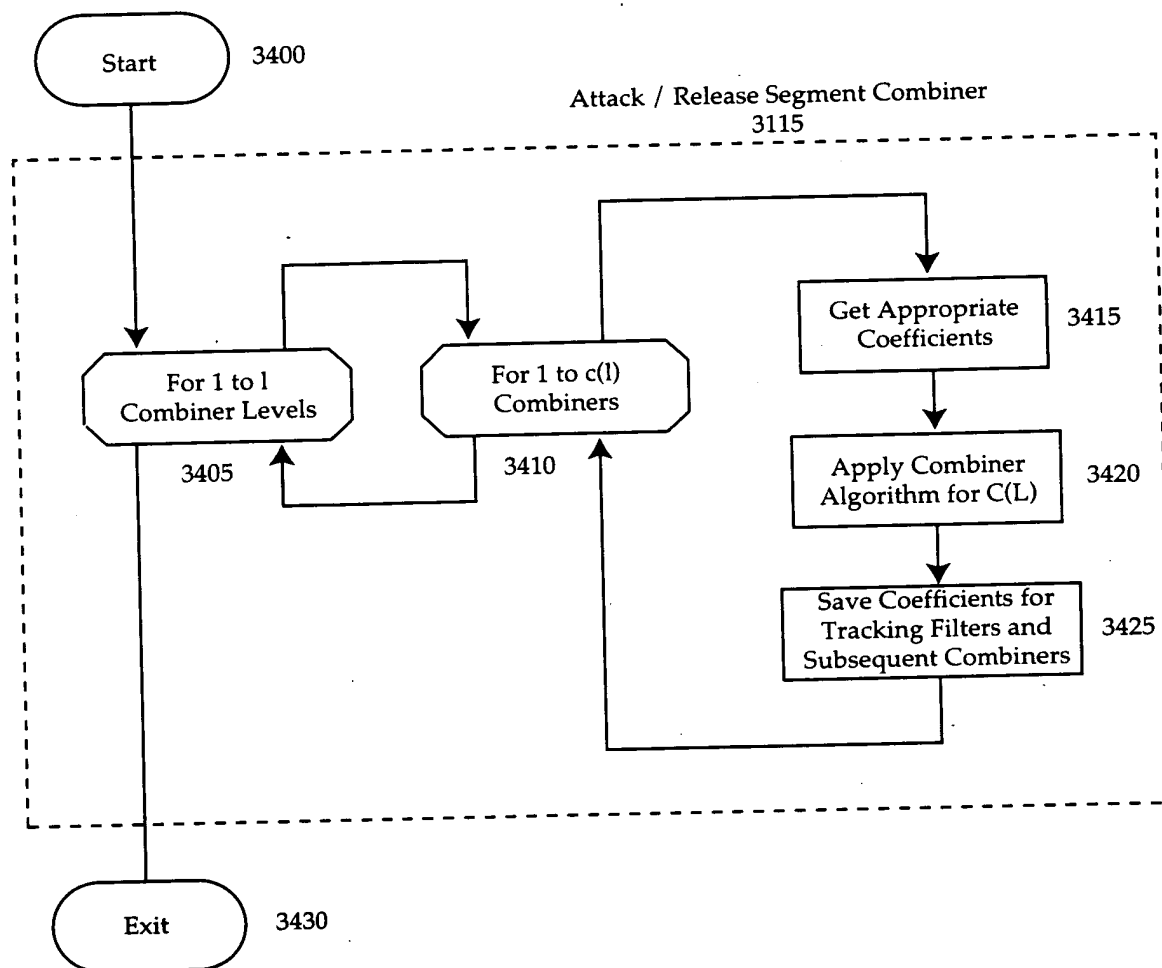


FIG. 34

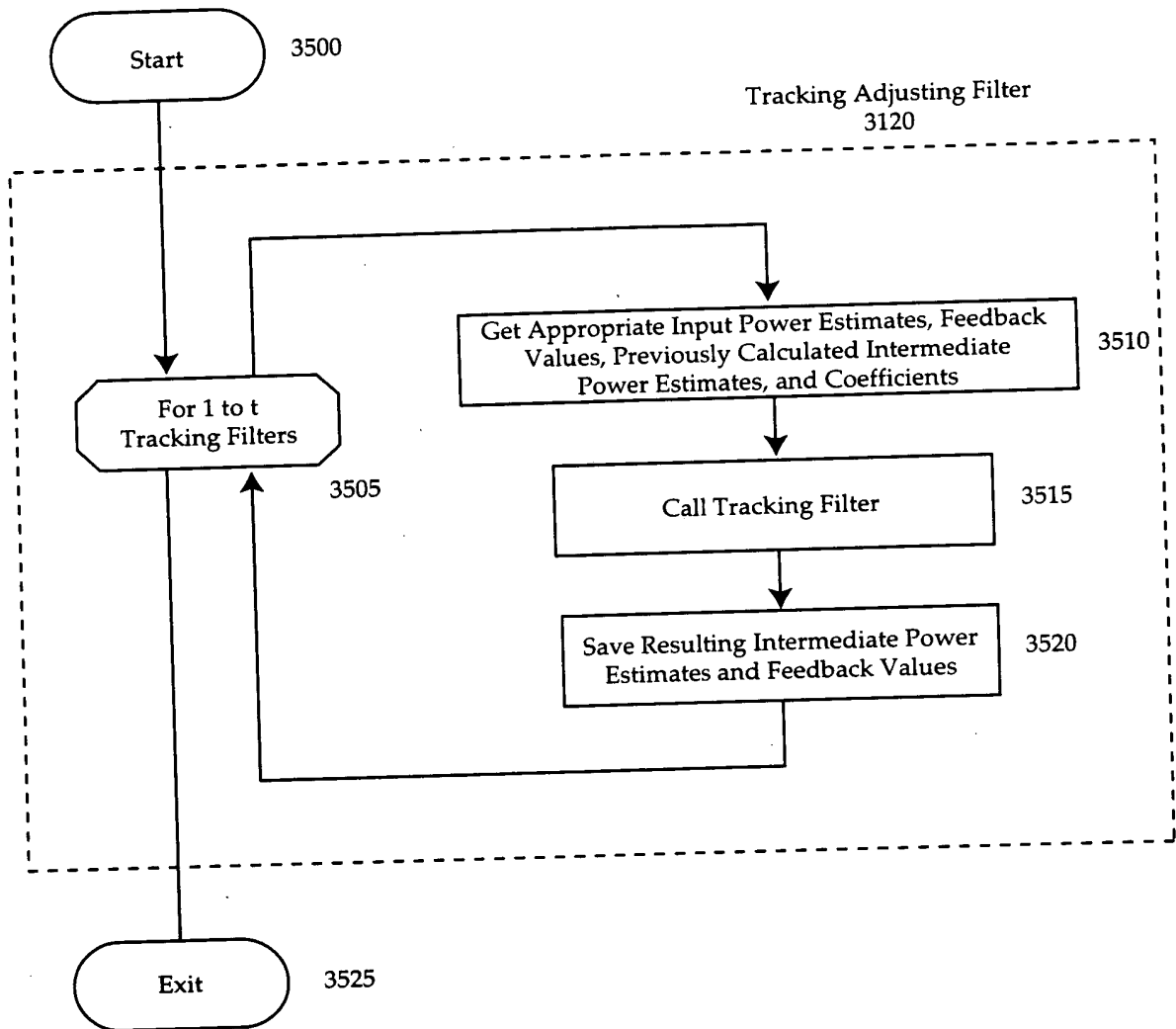


FIG. 35

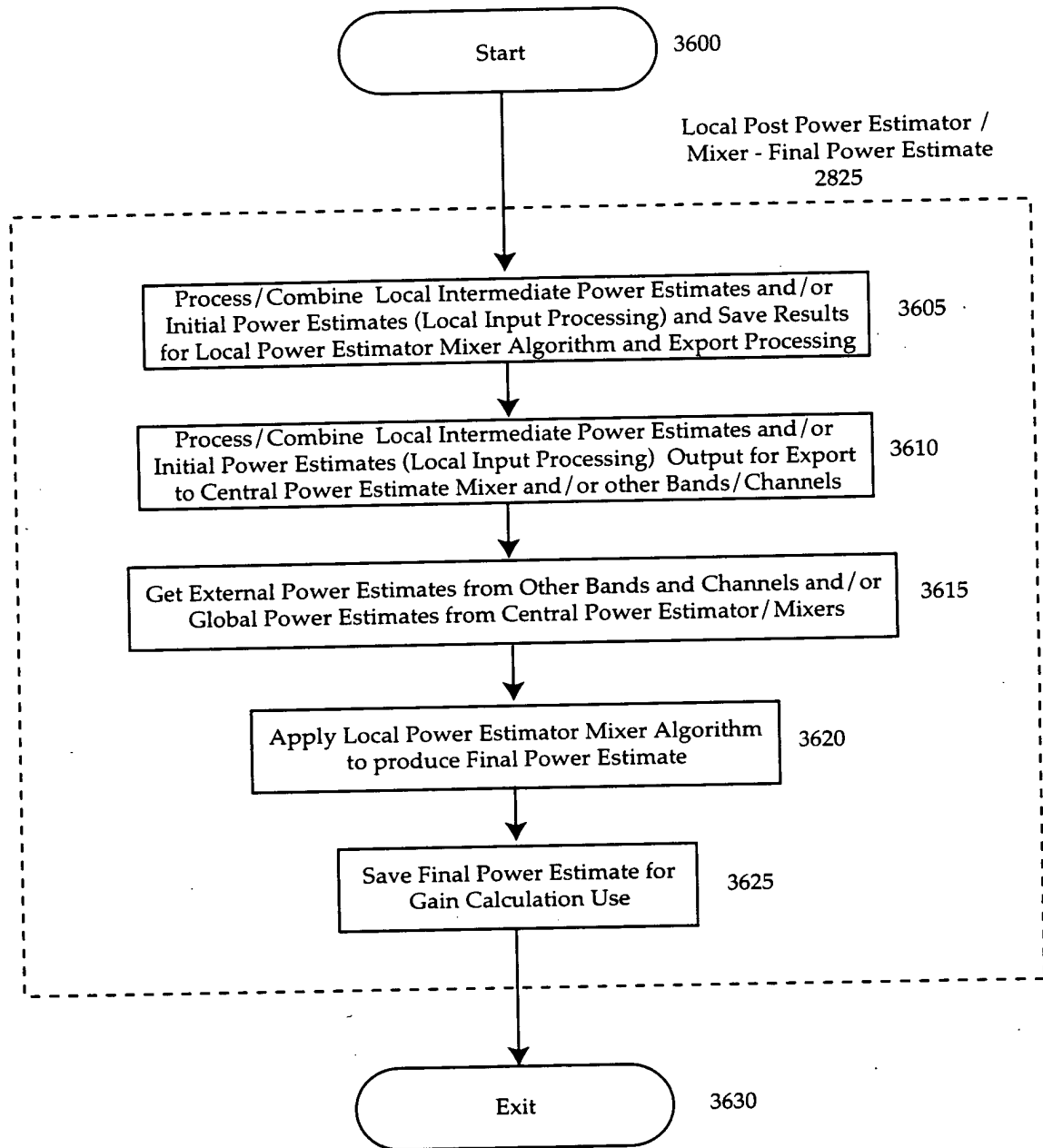


FIG. 36

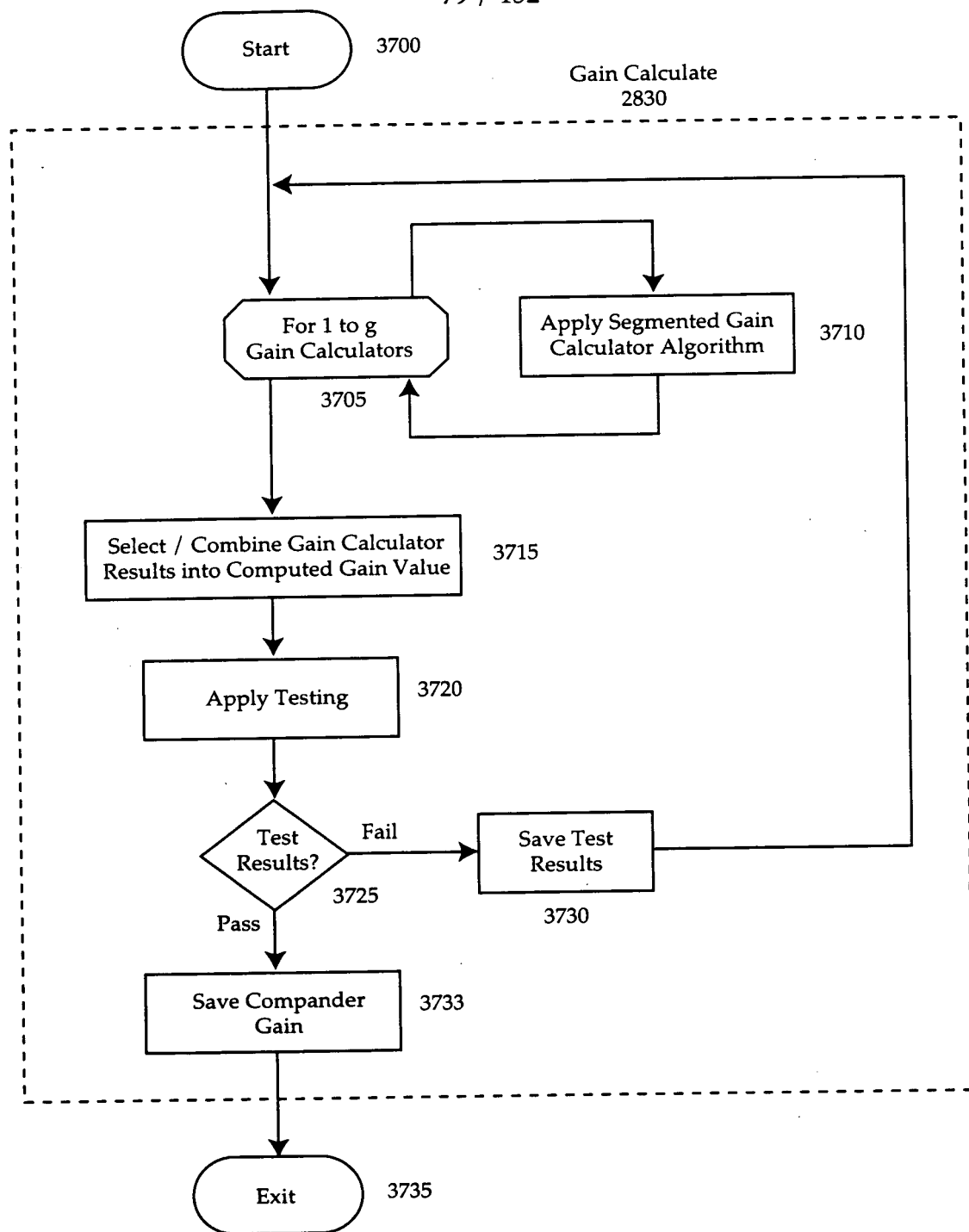


FIG. 37A

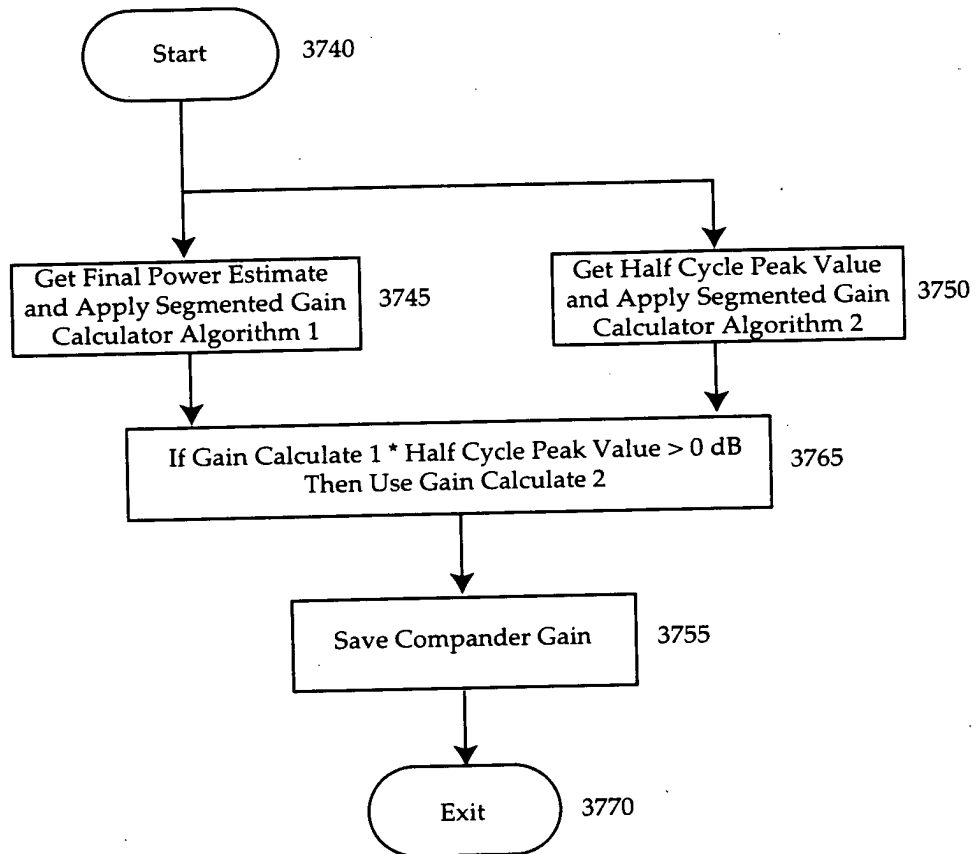


FIG. 37B

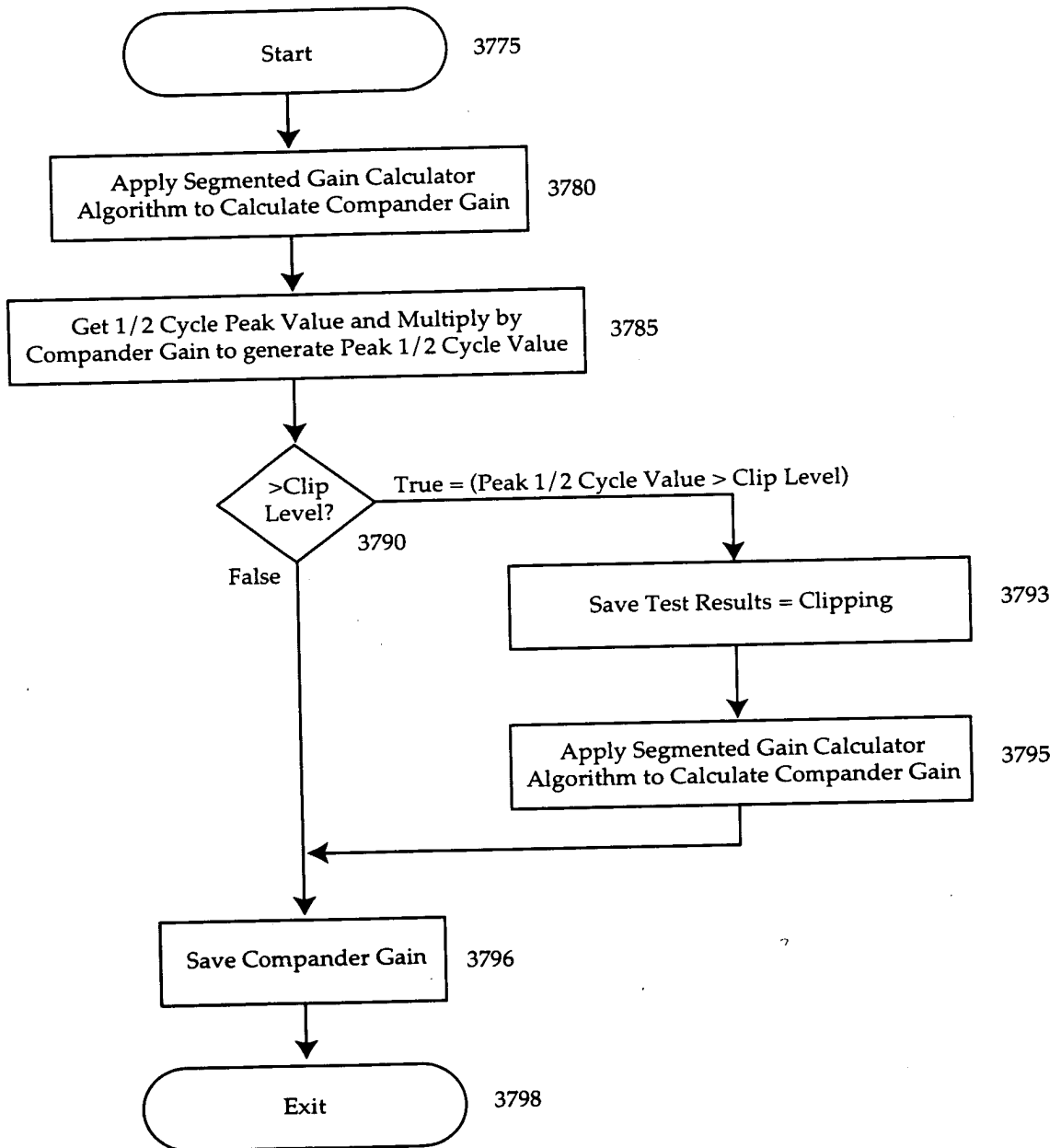


FIG. 37C

3800

Start

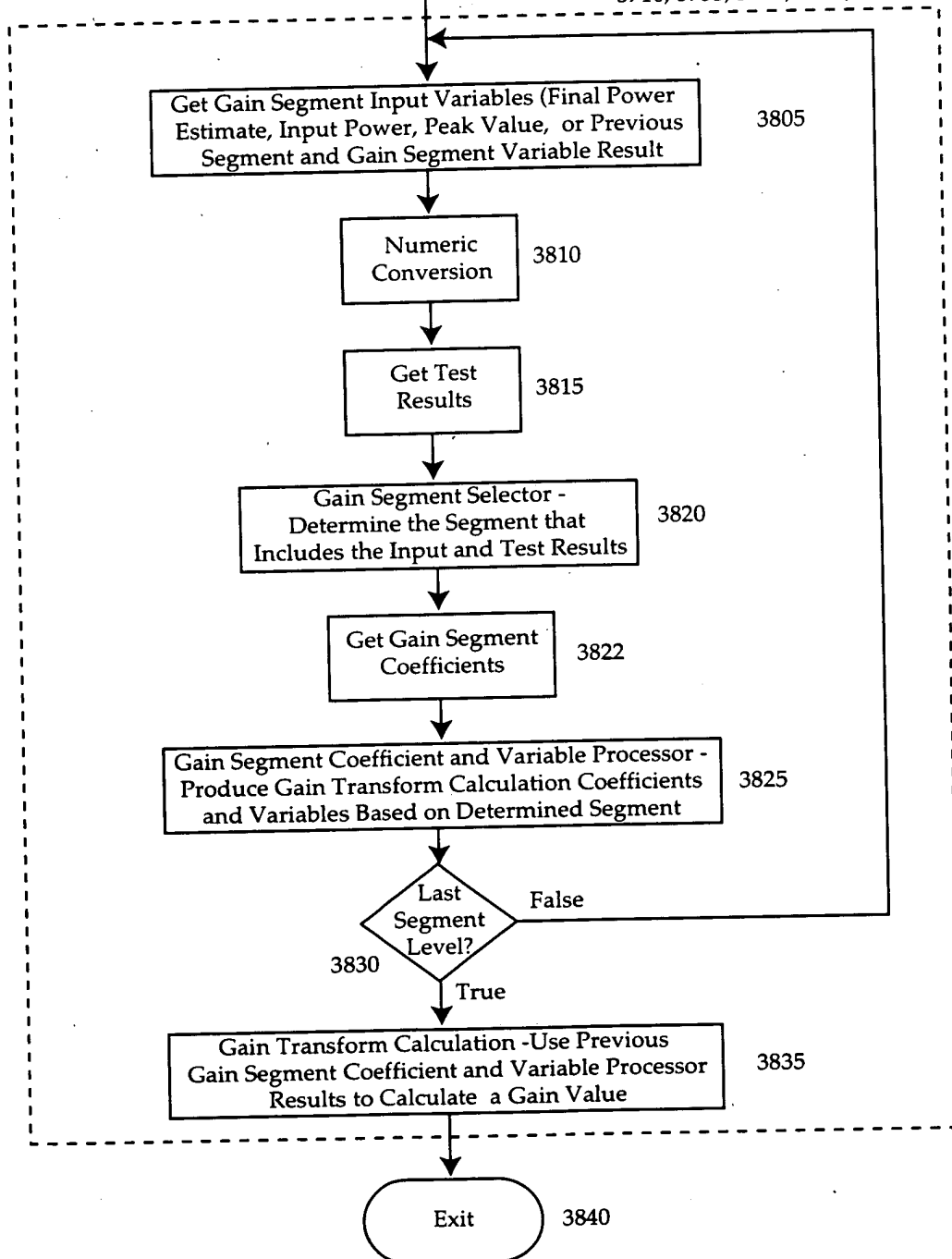
Segmented Gain Calculate Algorithm
3710, 3755, 3760, 3780, 3795

FIG. 38

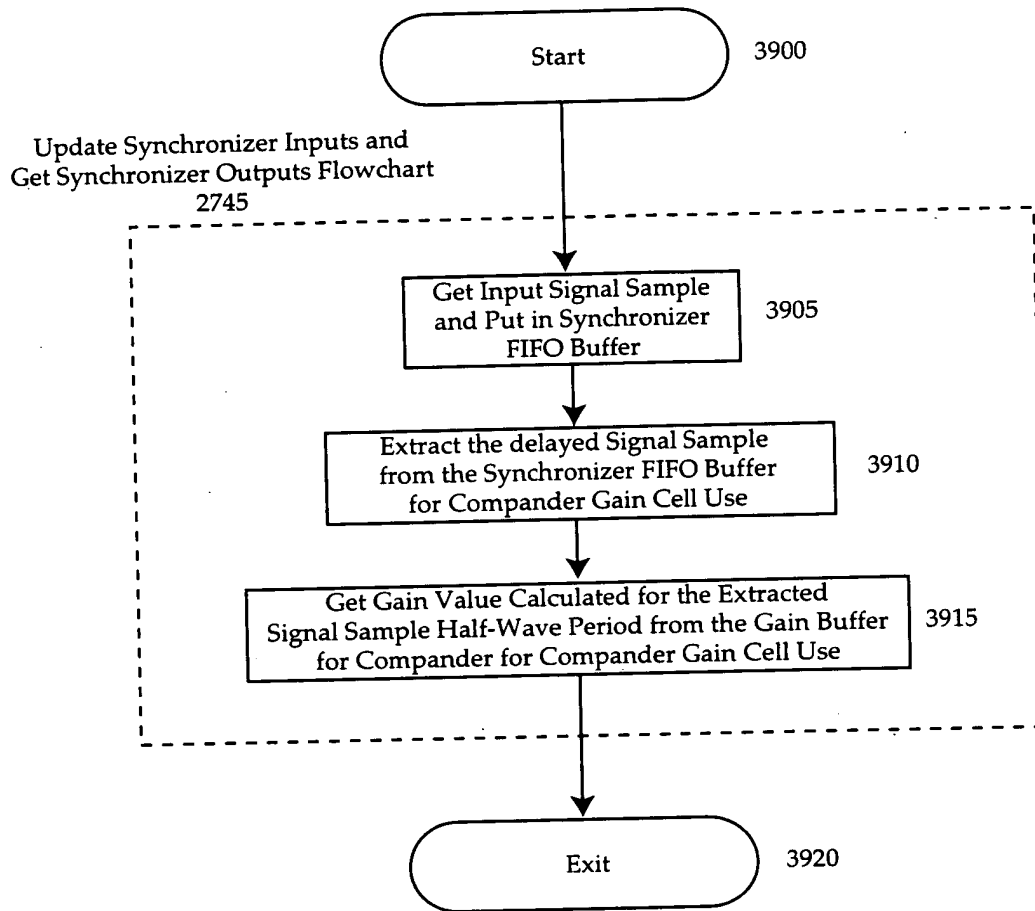
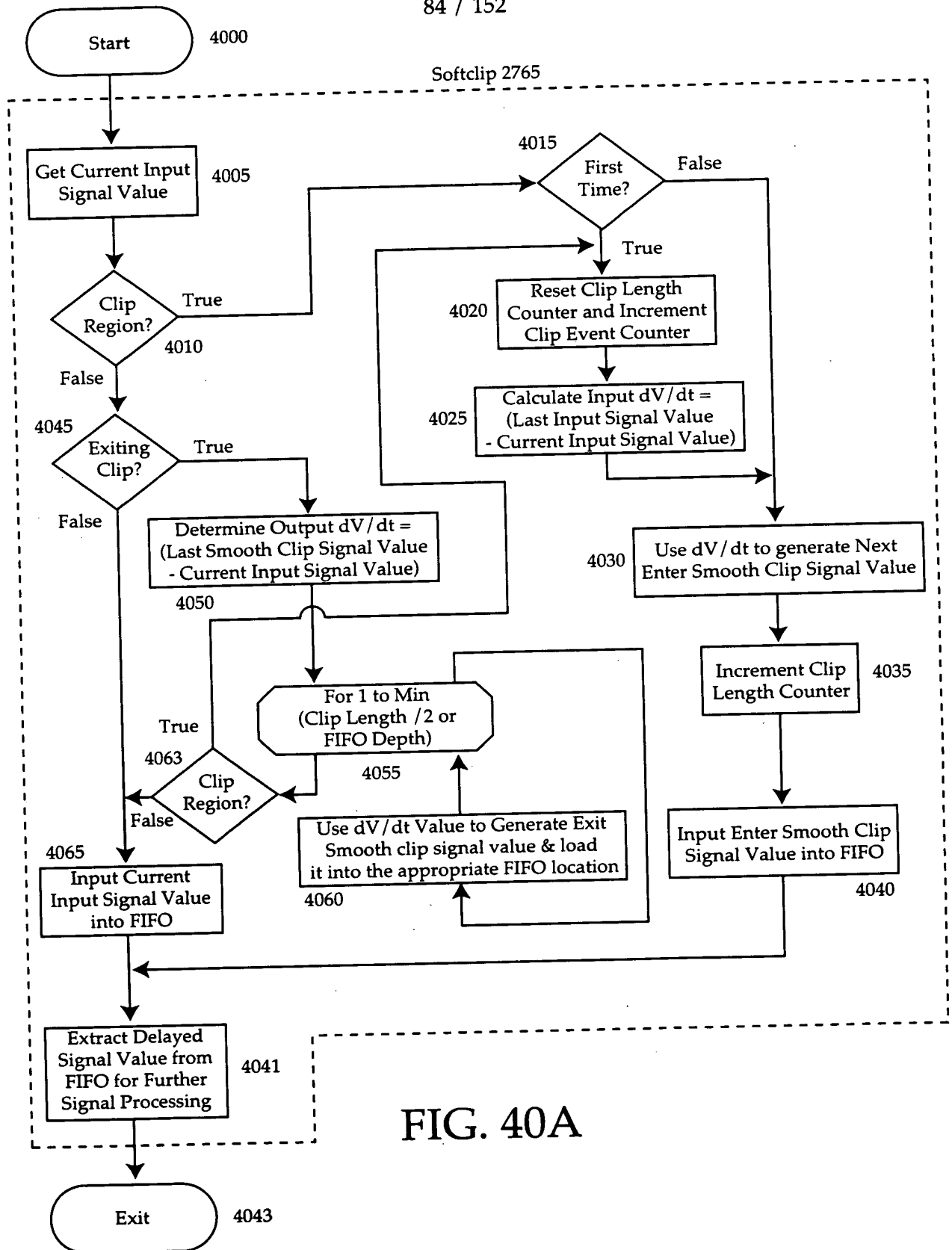


FIG. 39



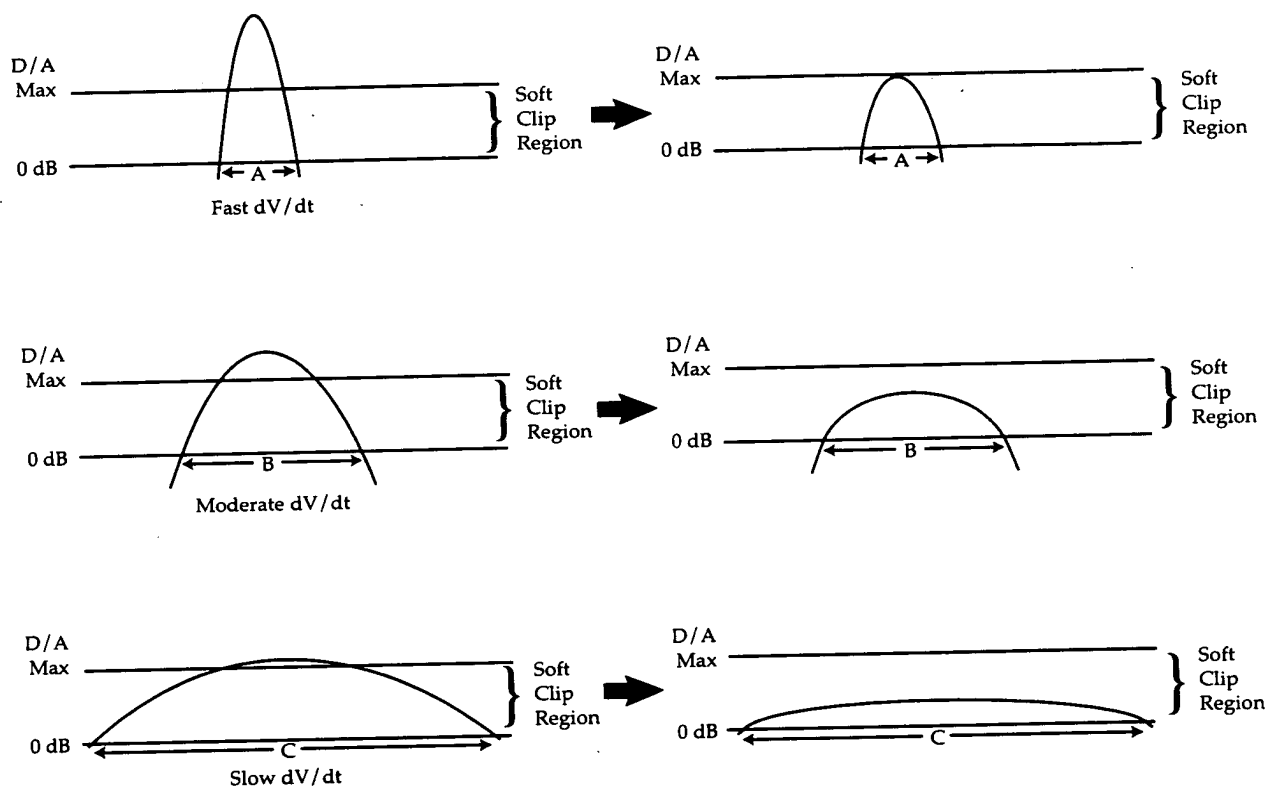


FIG. 40B

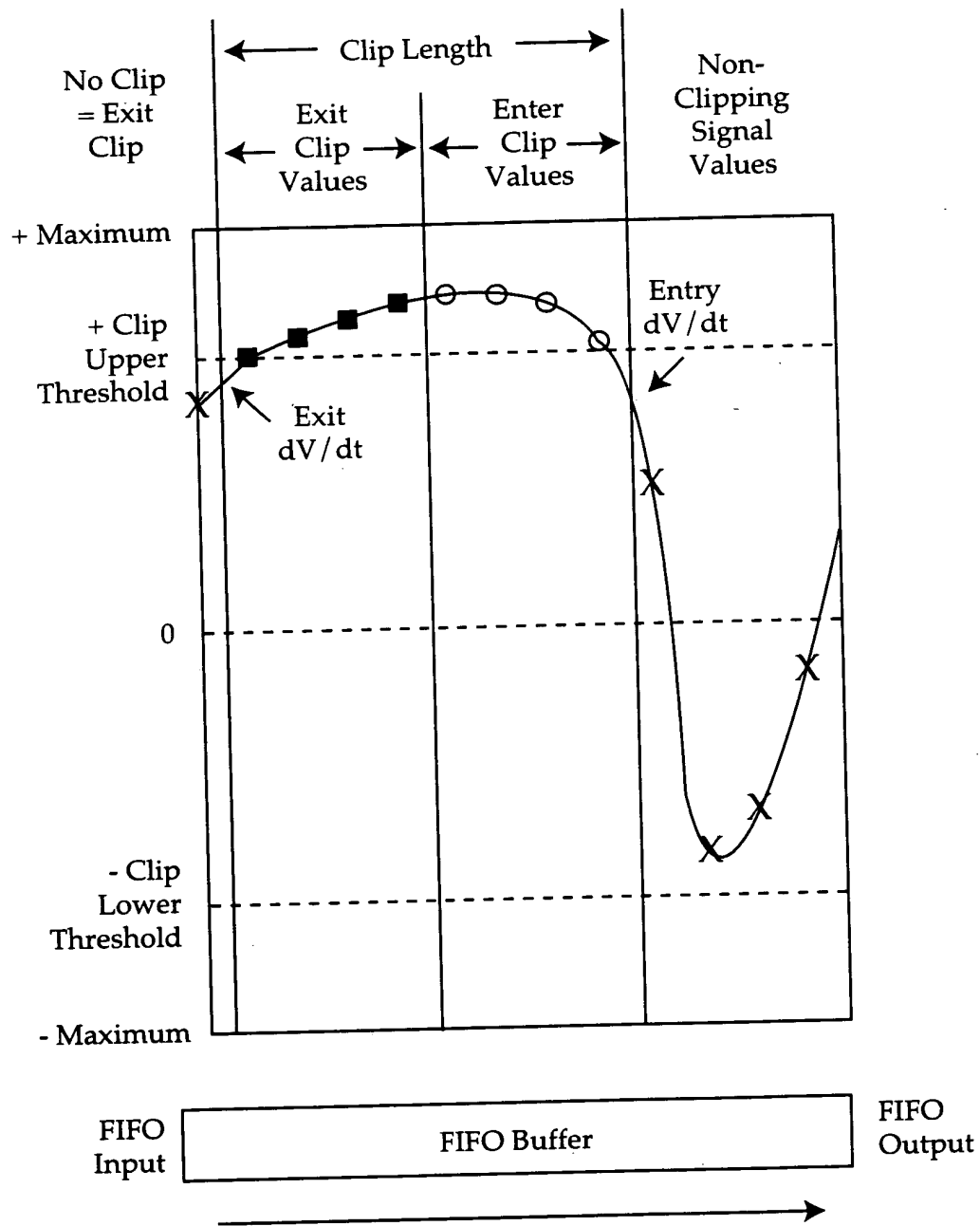


FIG. 40C

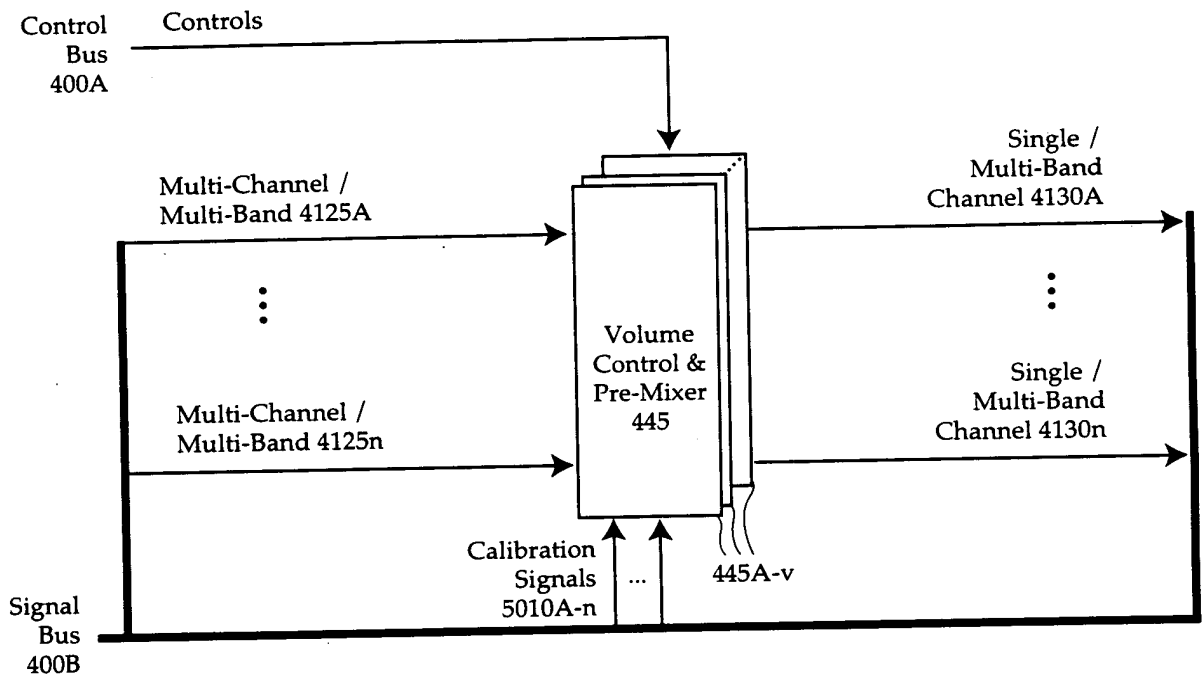


FIG. 41A

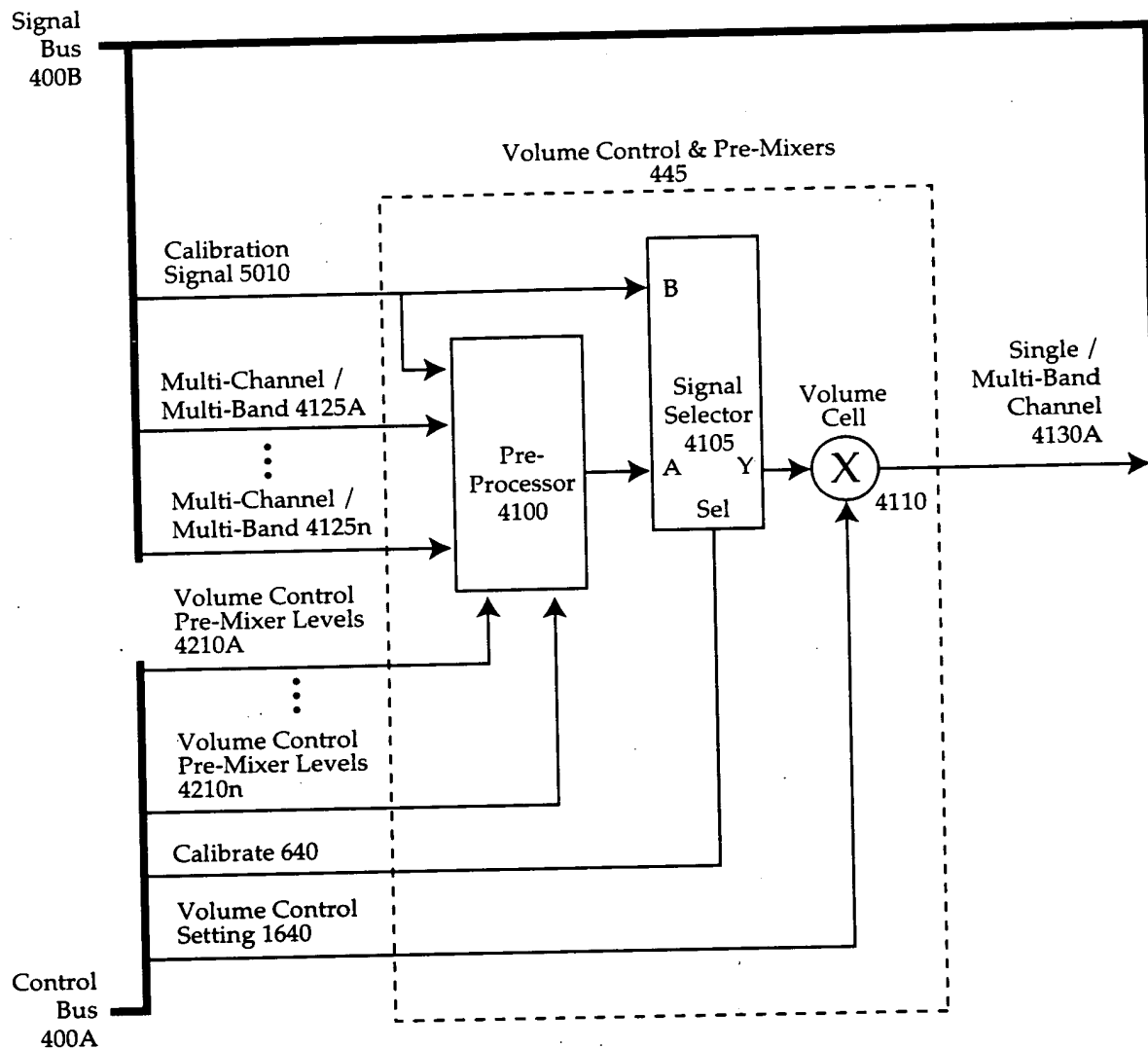


FIG. 41B

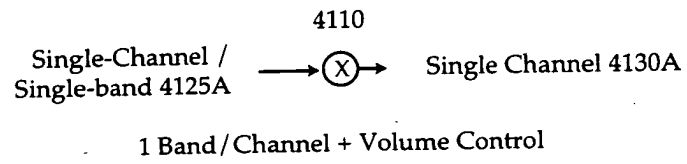


FIG. 42A

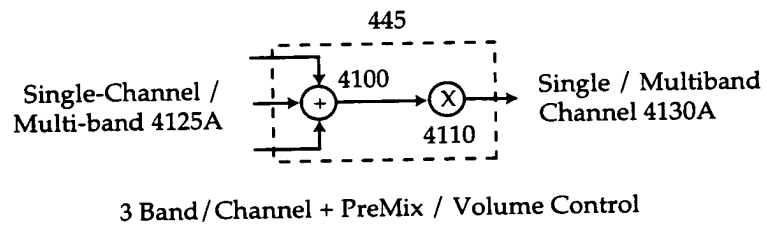
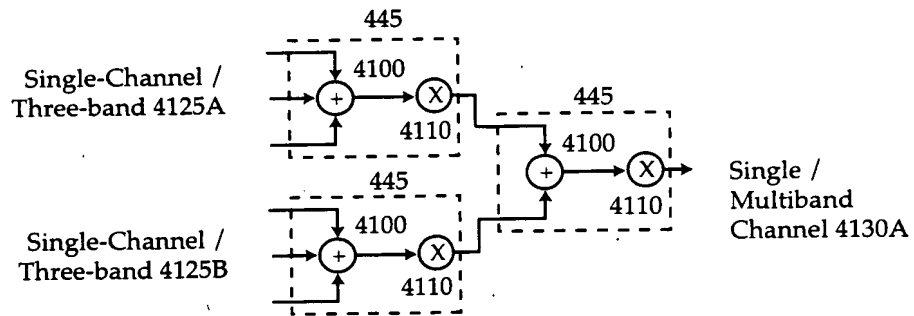
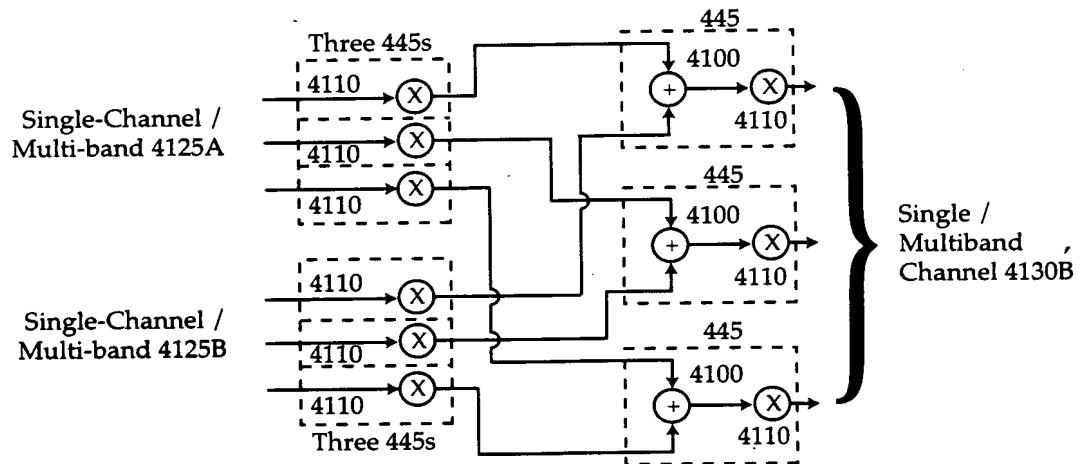


FIG. 42B



3 Band/Channel + Pre-Mix / Volume Control > Premix Volume Control
 3 Band/Channel + Pre-Mix / Volume Control

FIG. 42C



3 Band/Channel + 3 Volume Control > 3 Premix Volume Control
 3 Band/Channel + 3 Volume Control

FIG. 42D

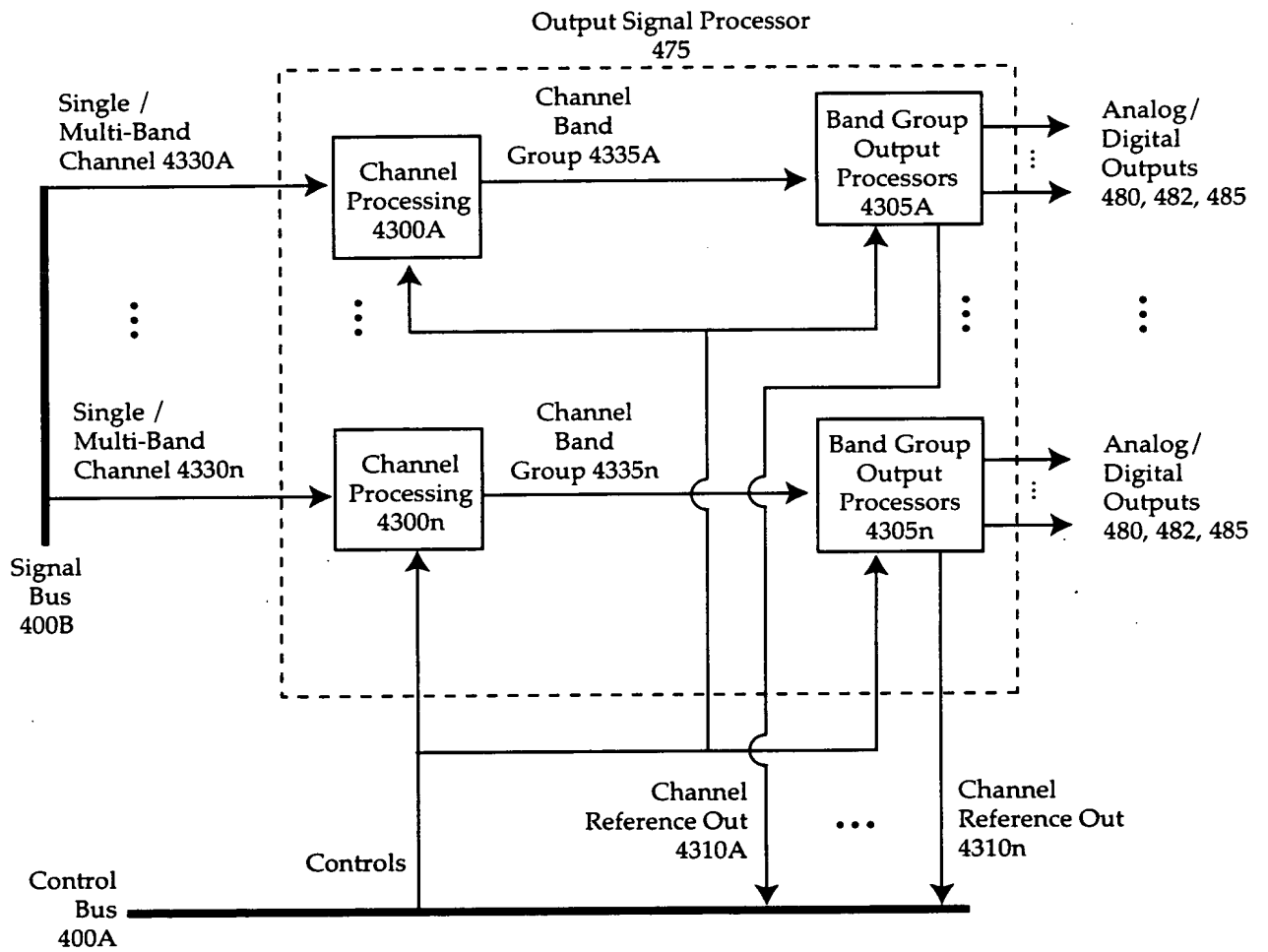


FIG. 43A

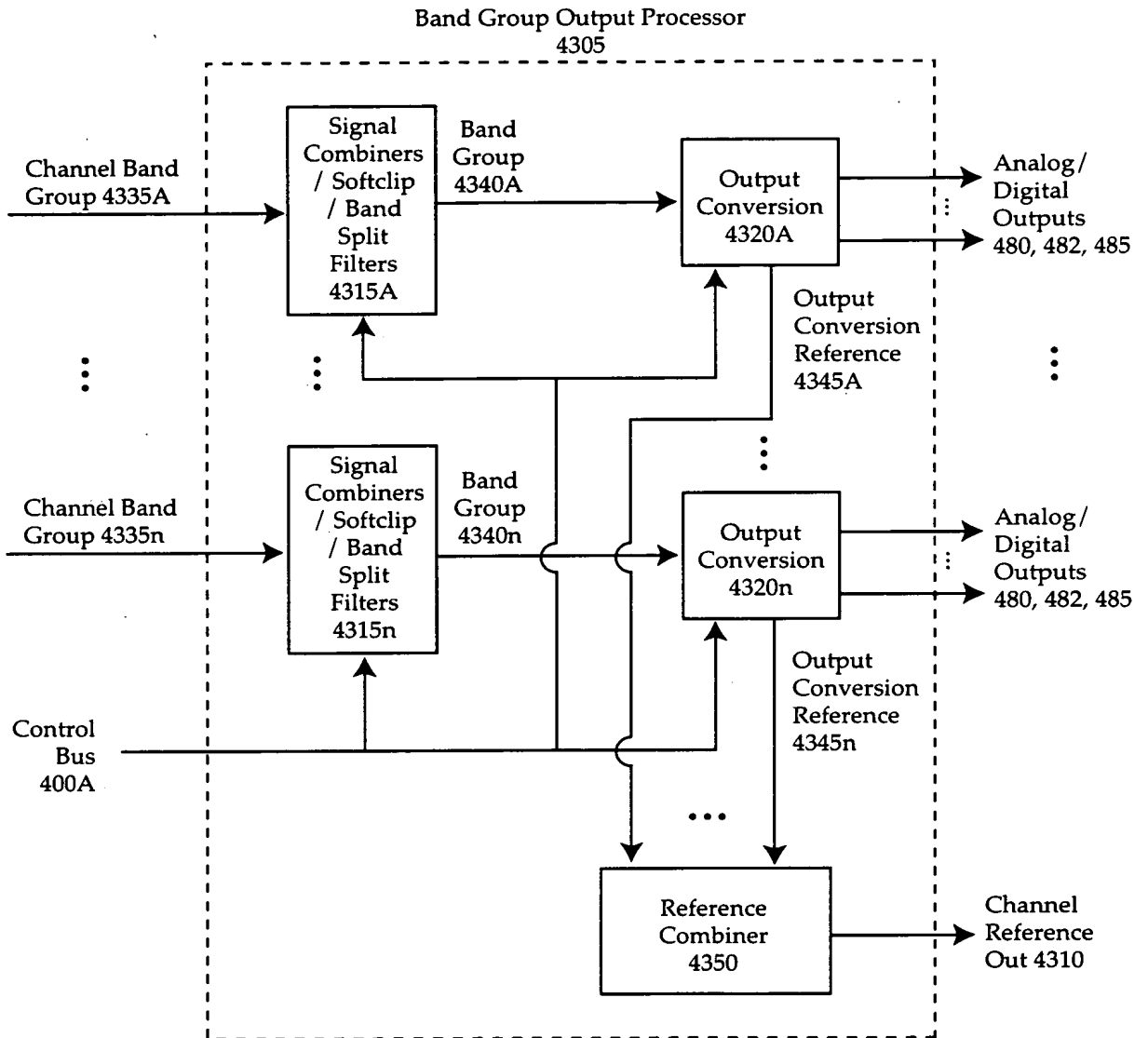


FIG. 43B

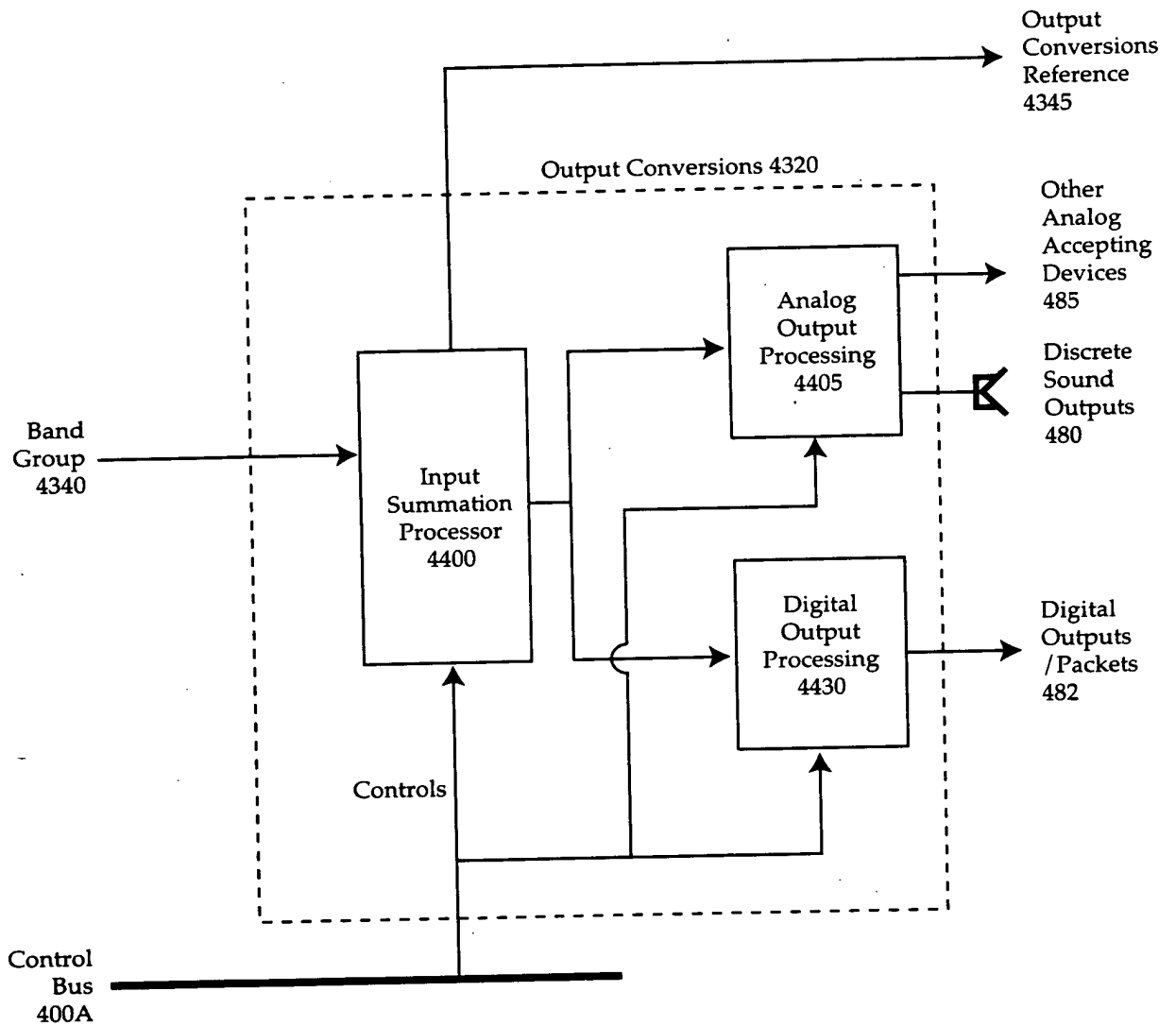


FIG. 44

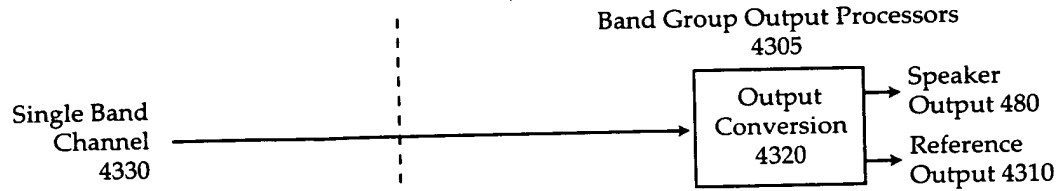


FIG. 45A

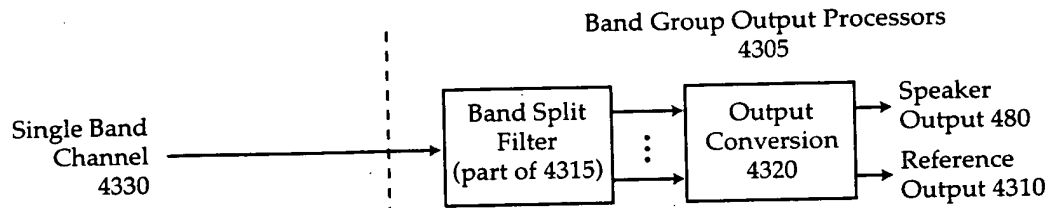


FIG. 45B

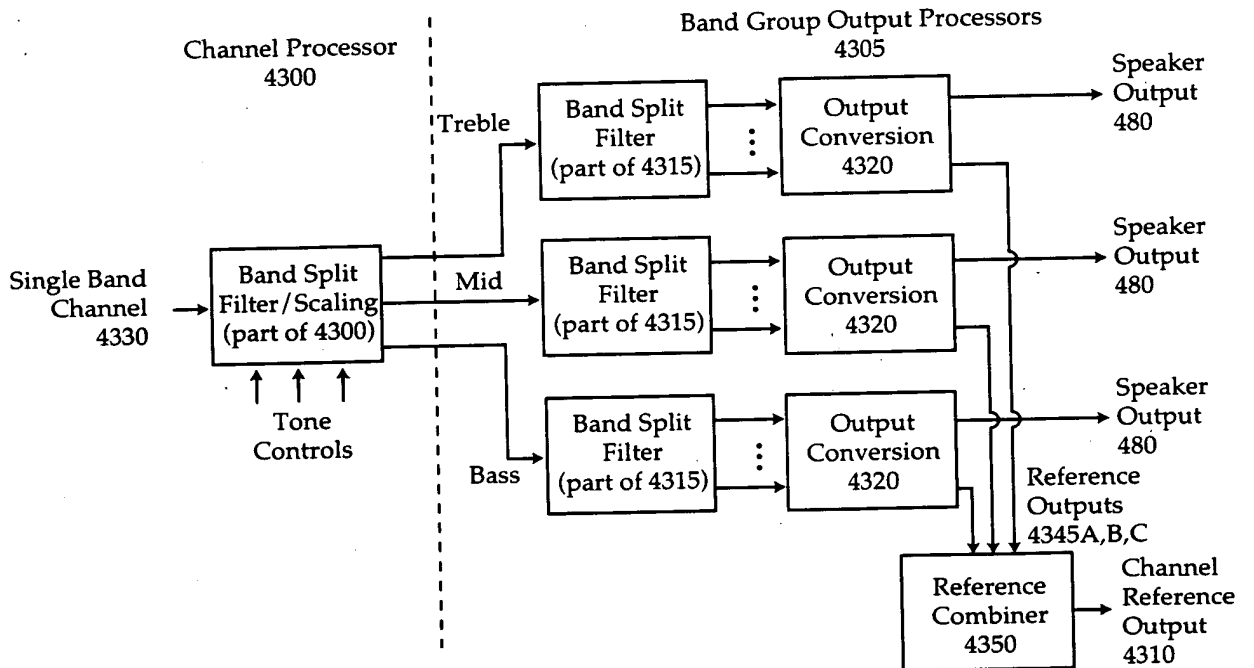


FIG. 45C

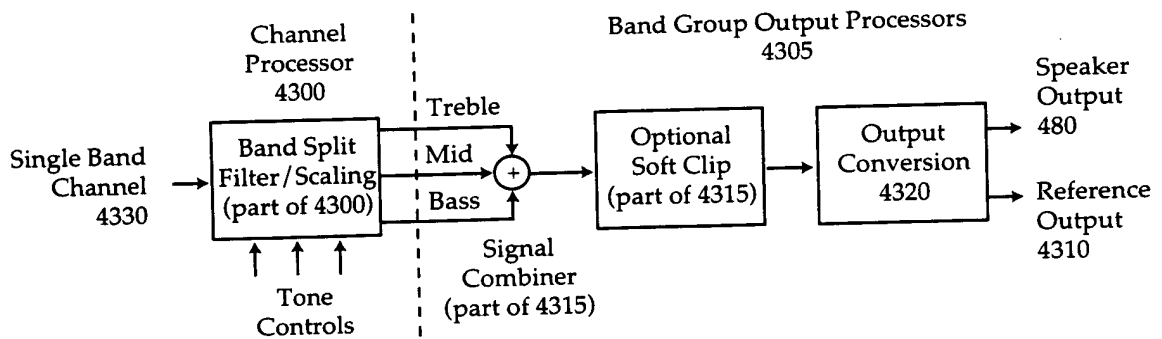


FIG. 45D

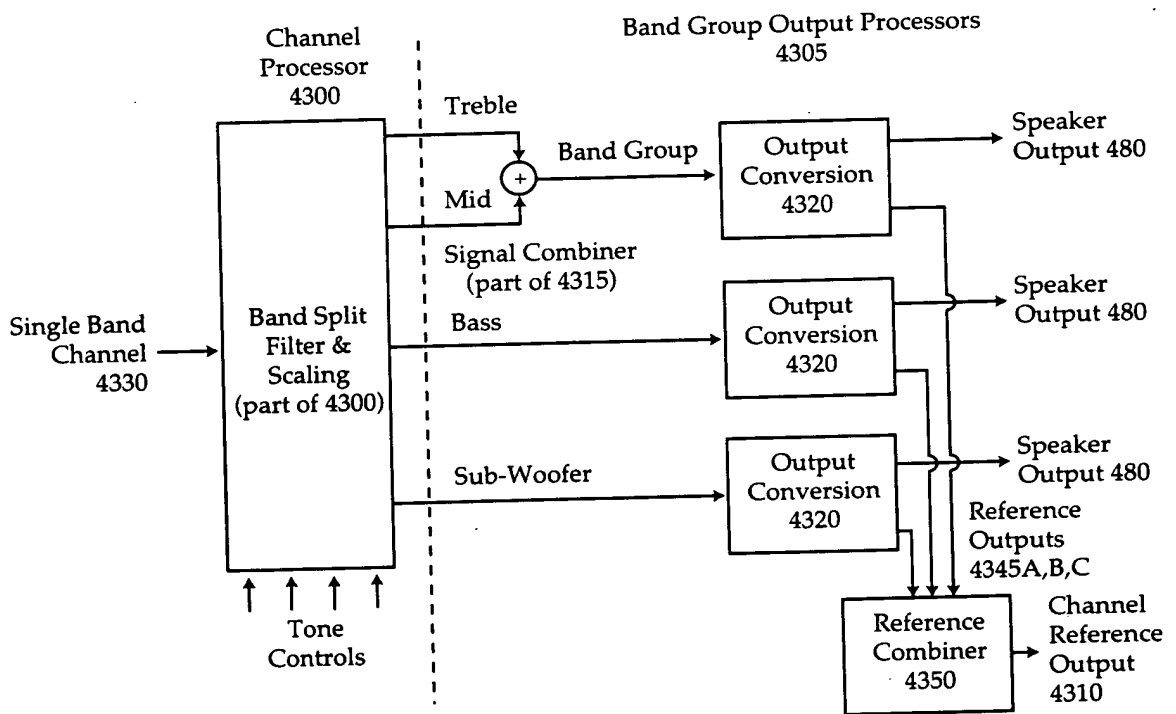


FIG. 45E

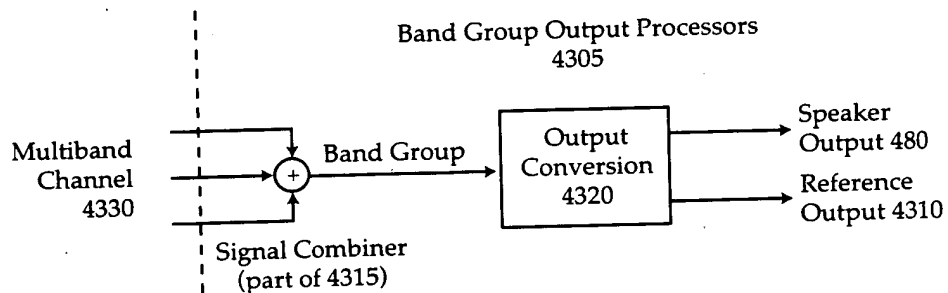


FIG. 45F

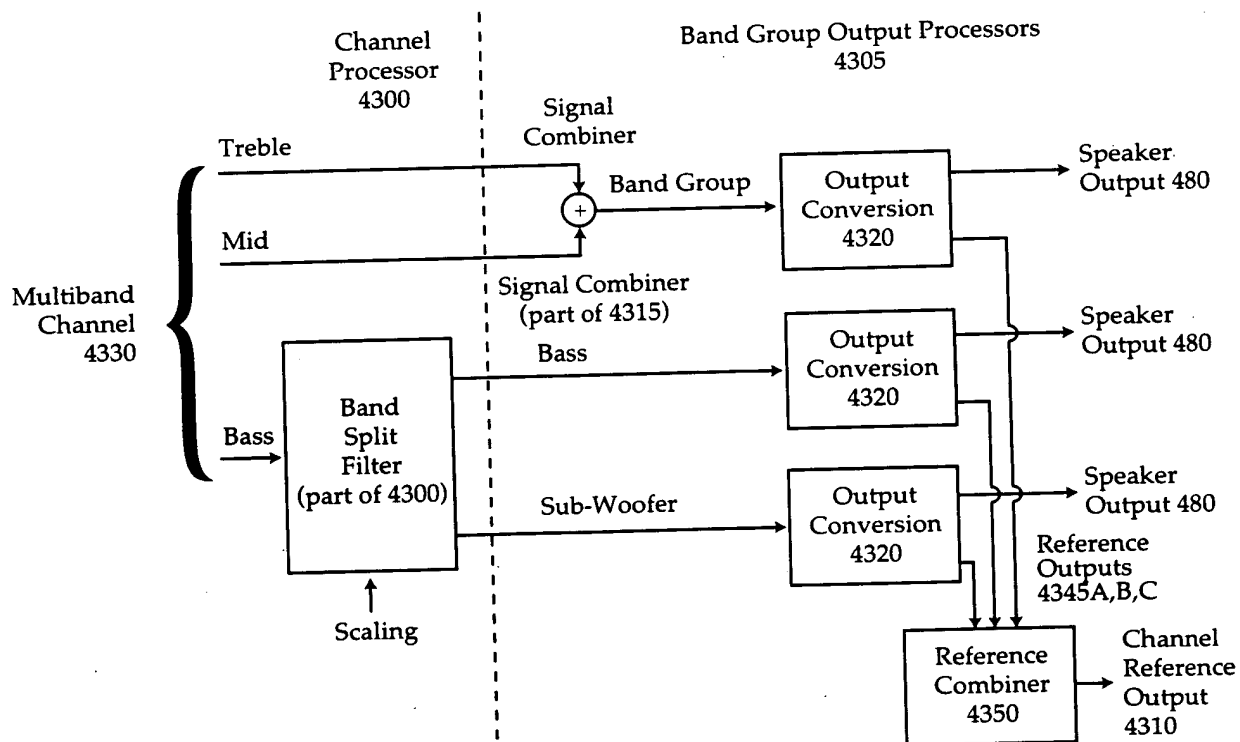
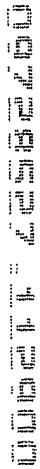


FIG. 45G



1

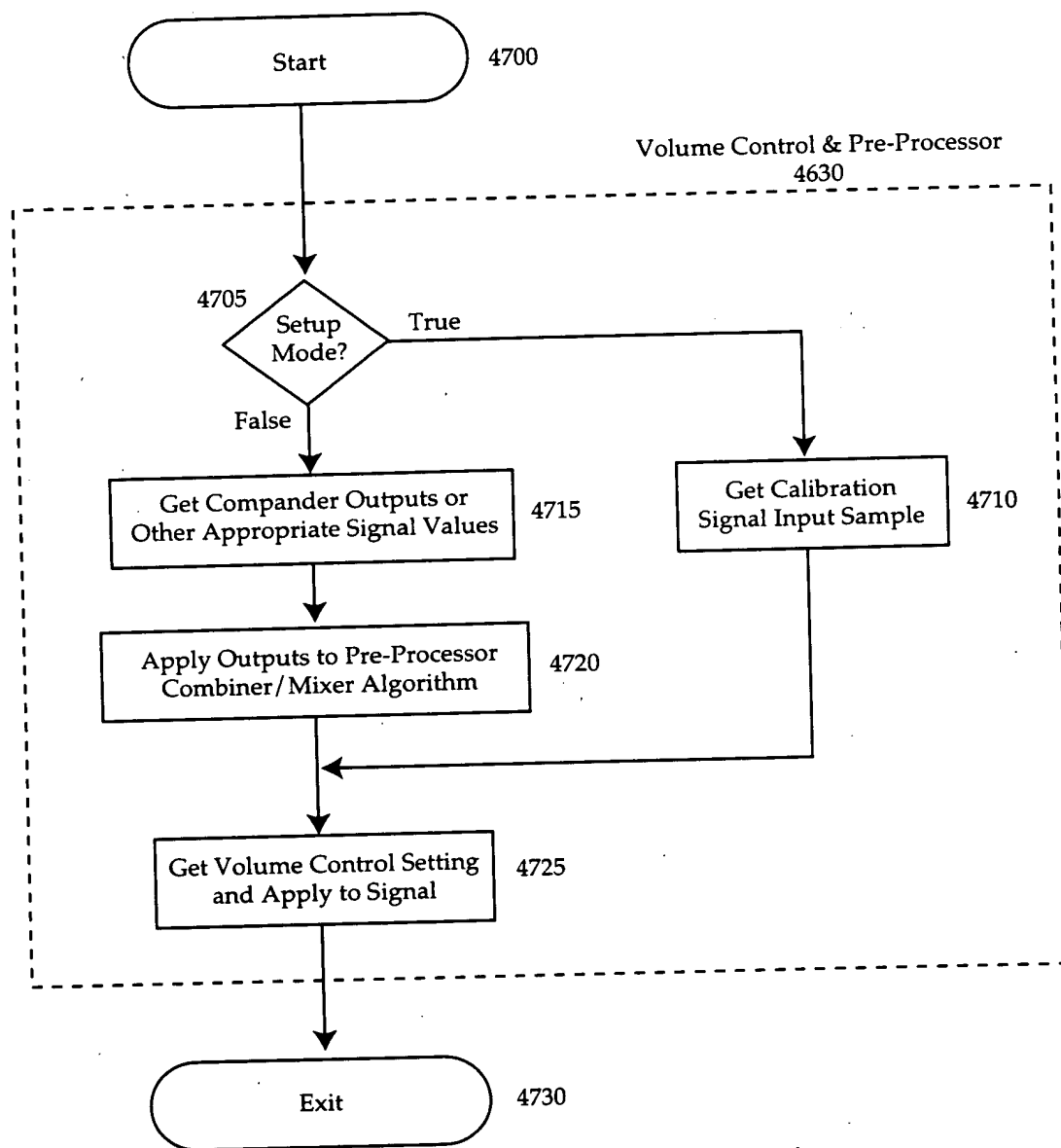


FIG. 47

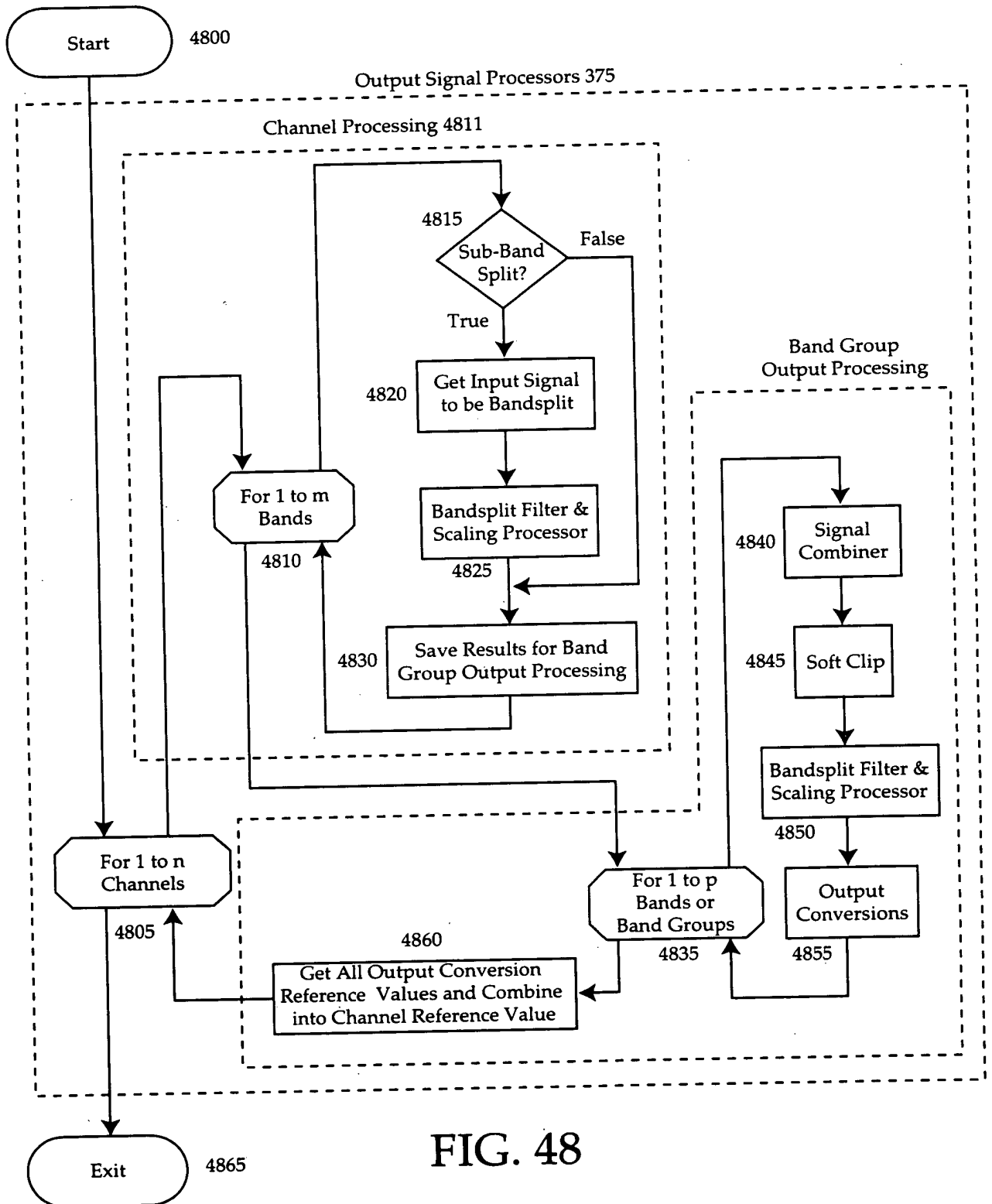


FIG. 48

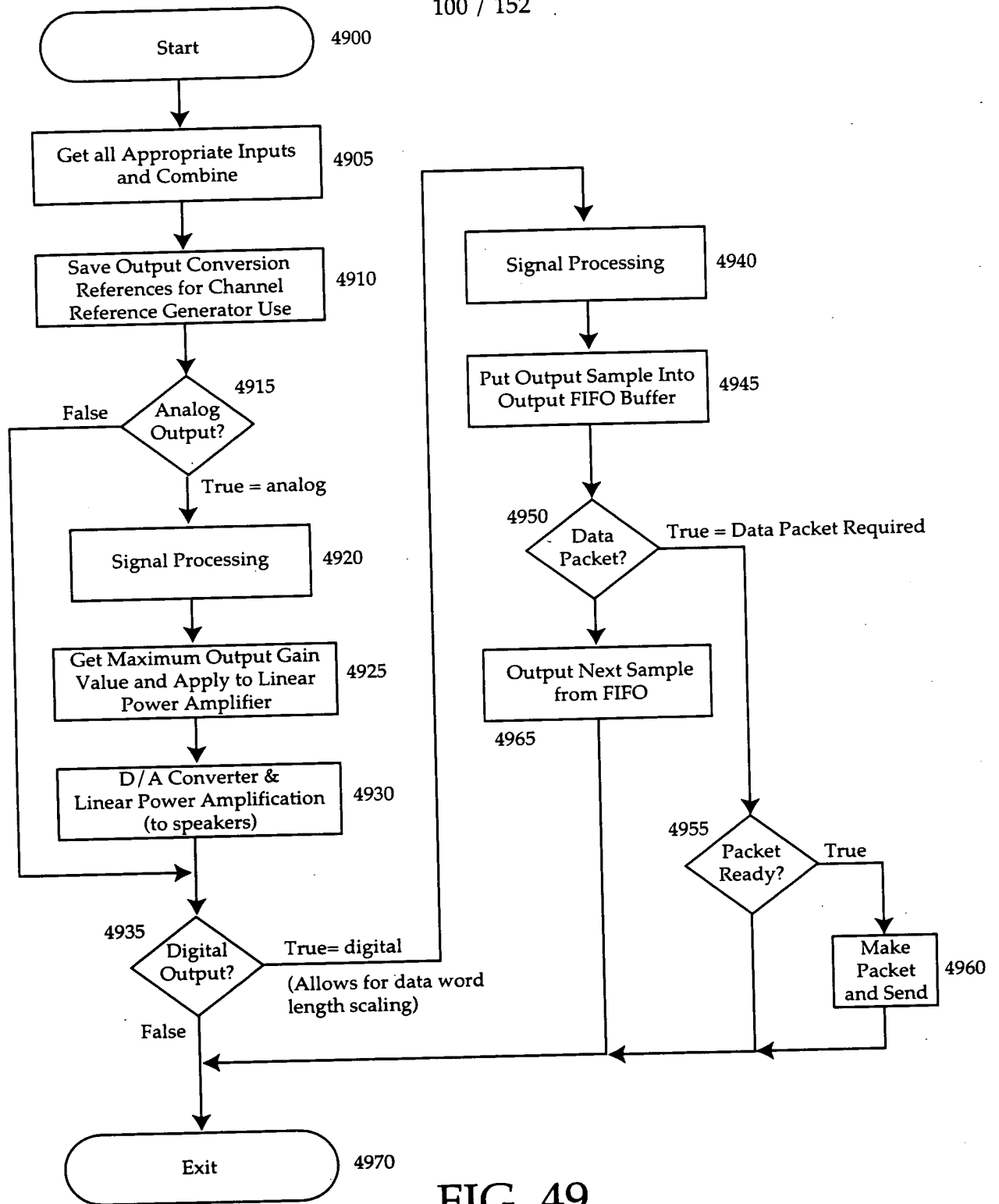


FIG. 49

Calibrator / Annunciator 420

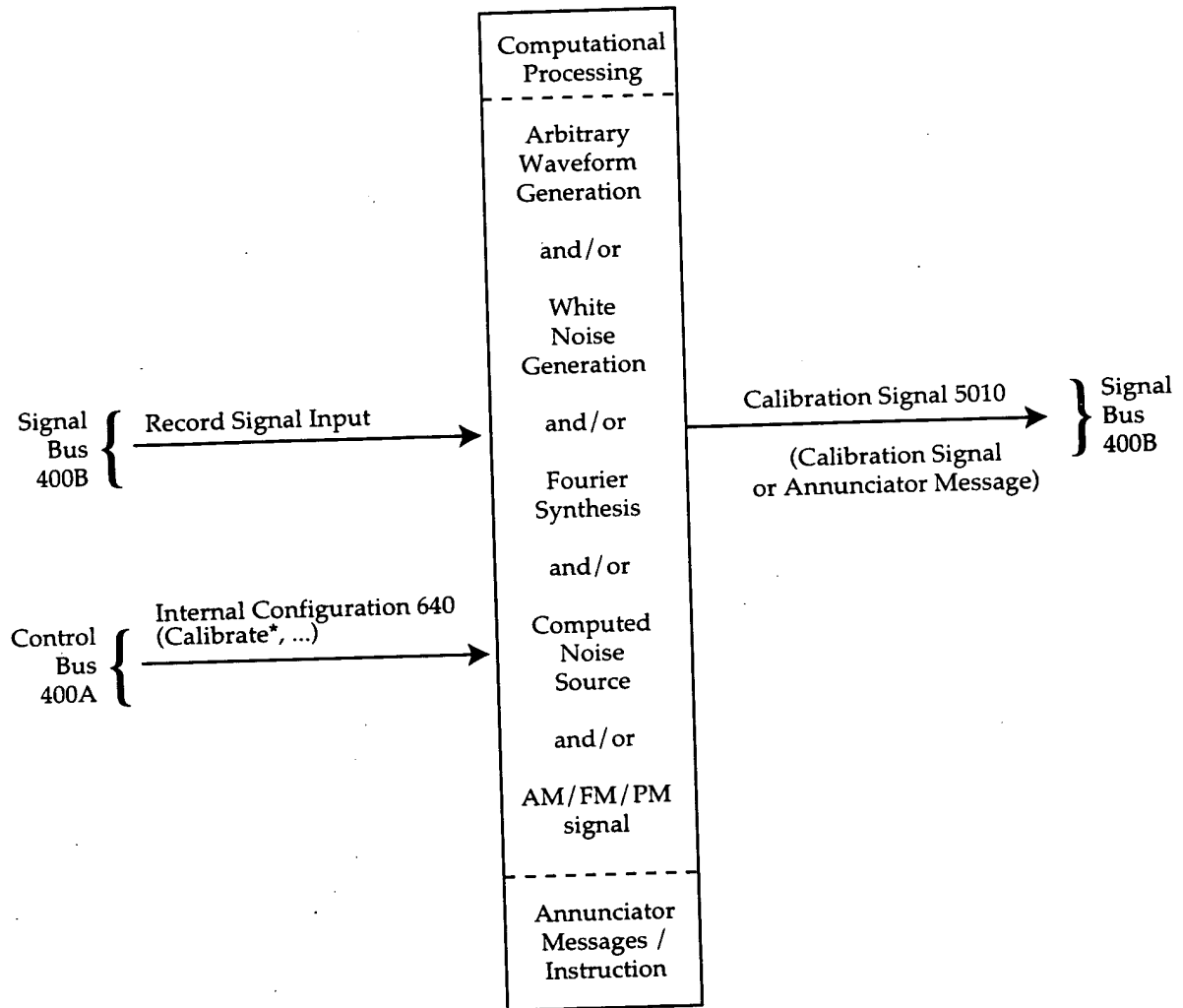


FIG. 50

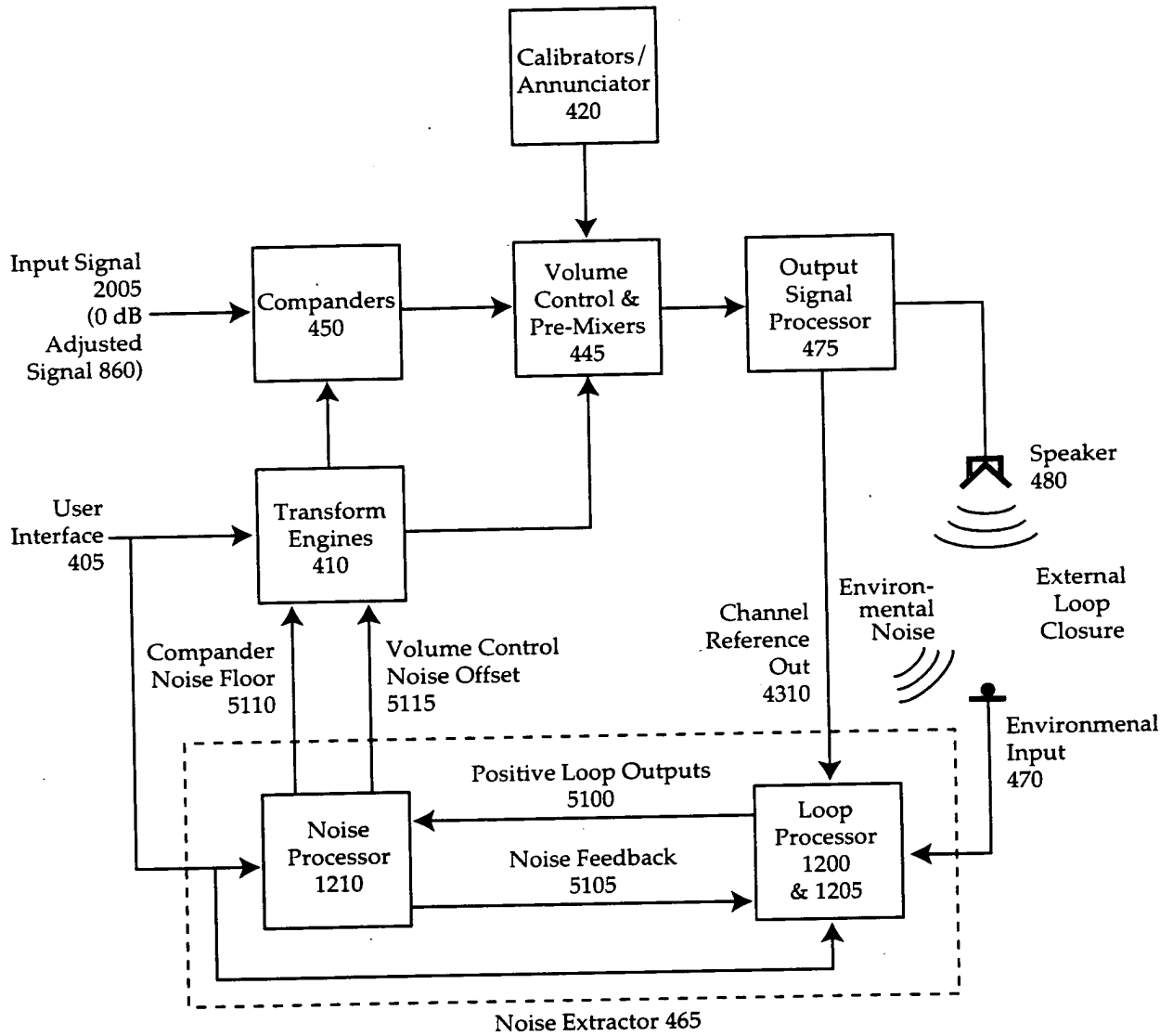


FIG. 51

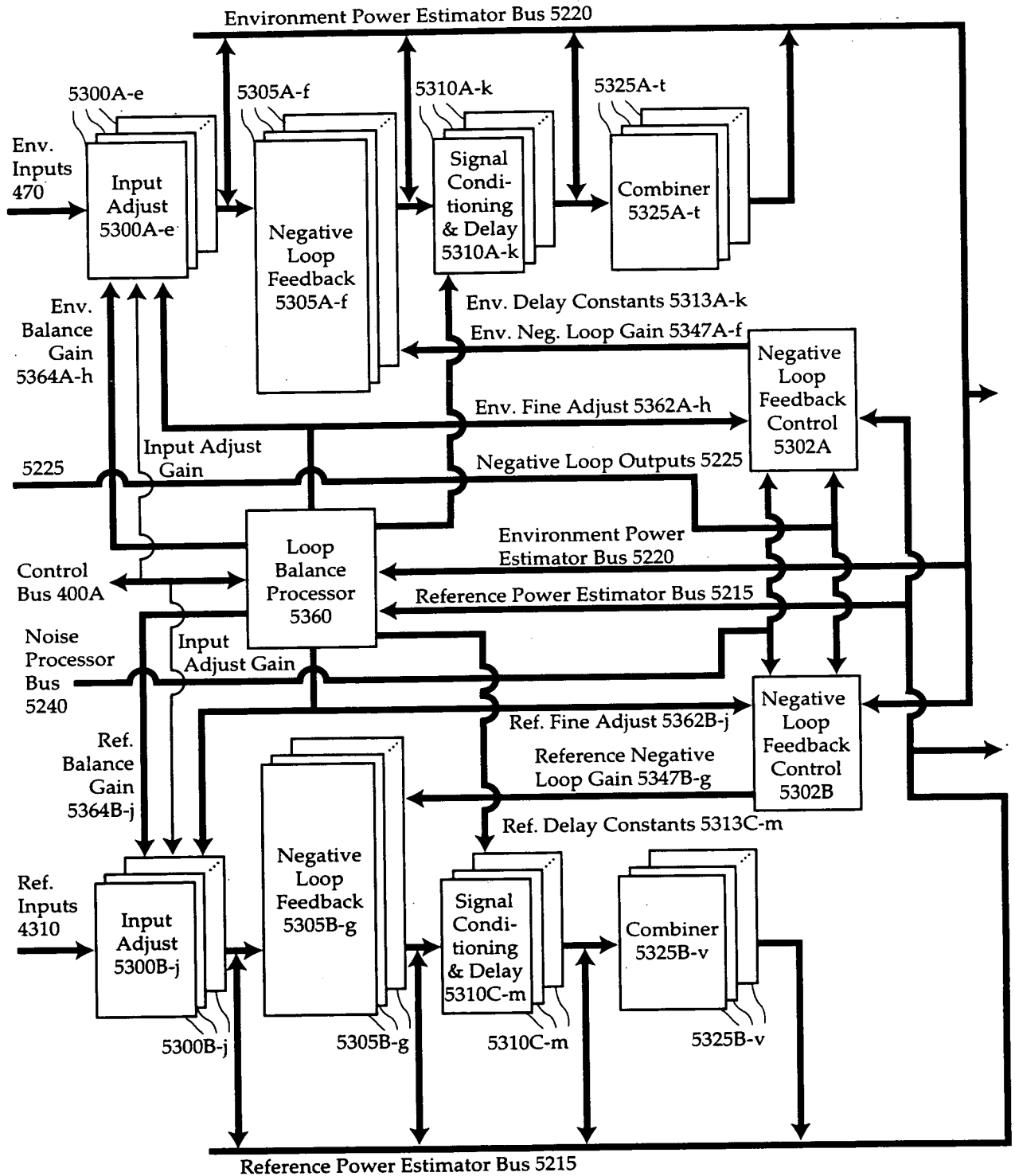


FIG. 52A

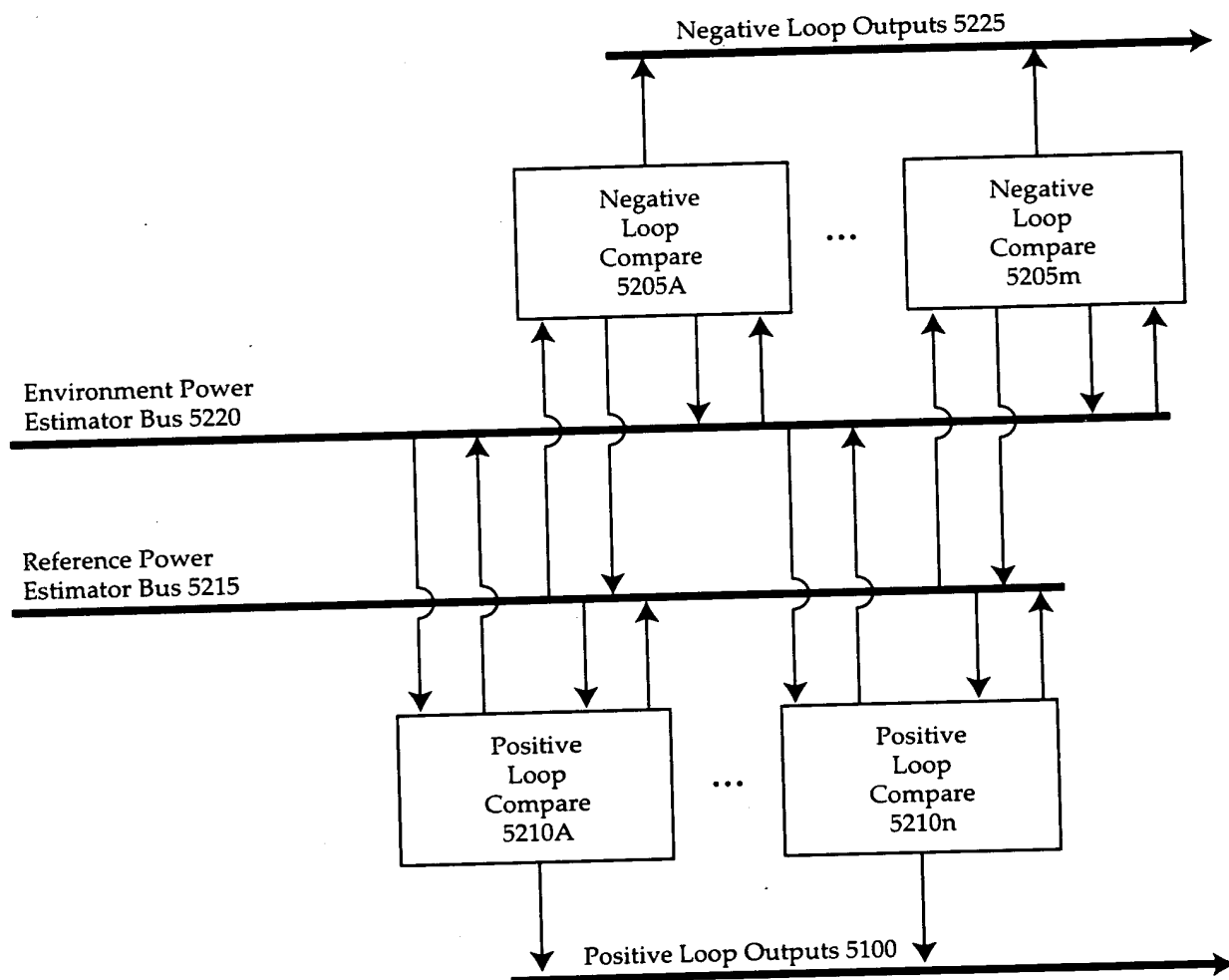


FIG. 52B

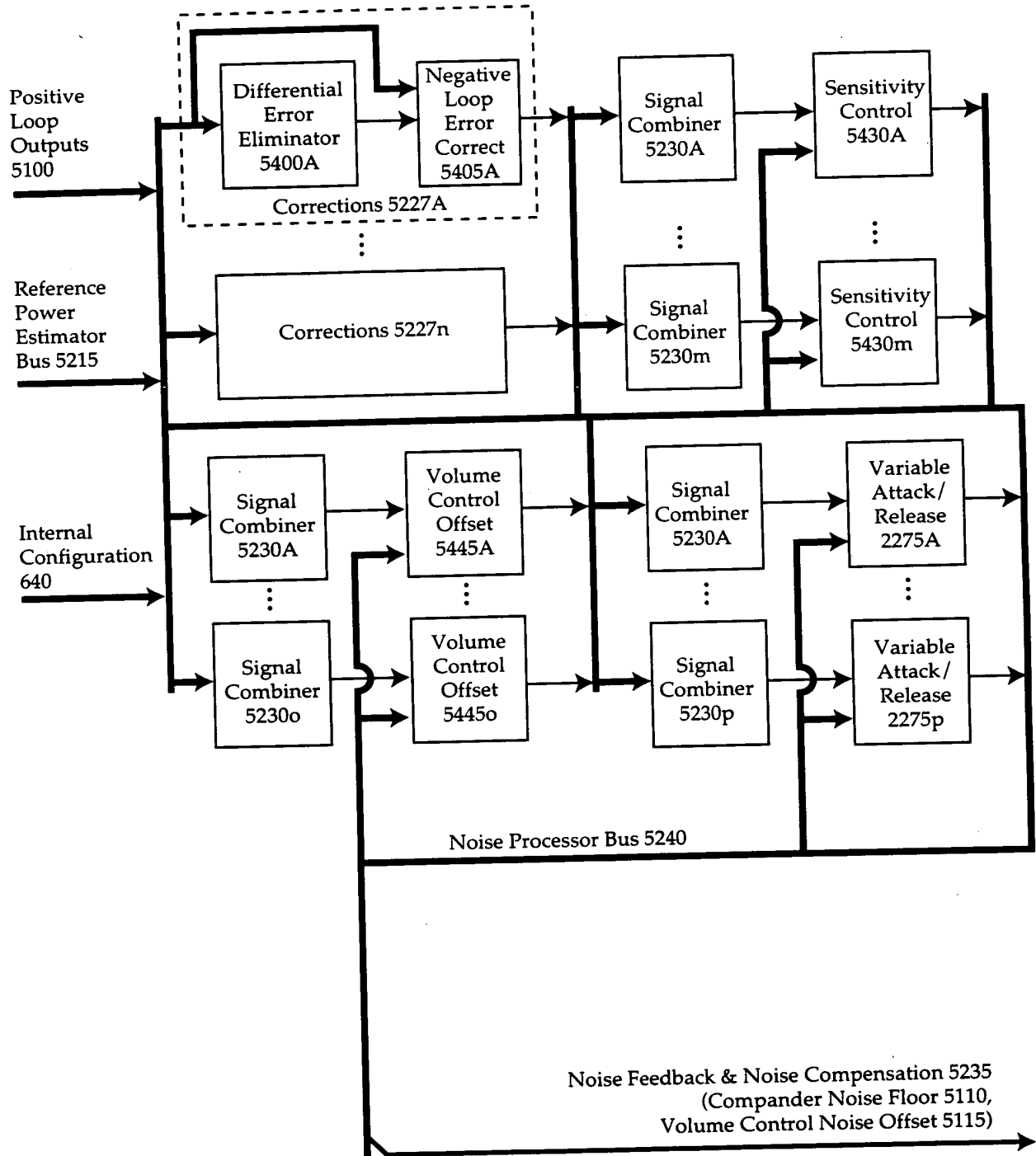


FIG. 52C

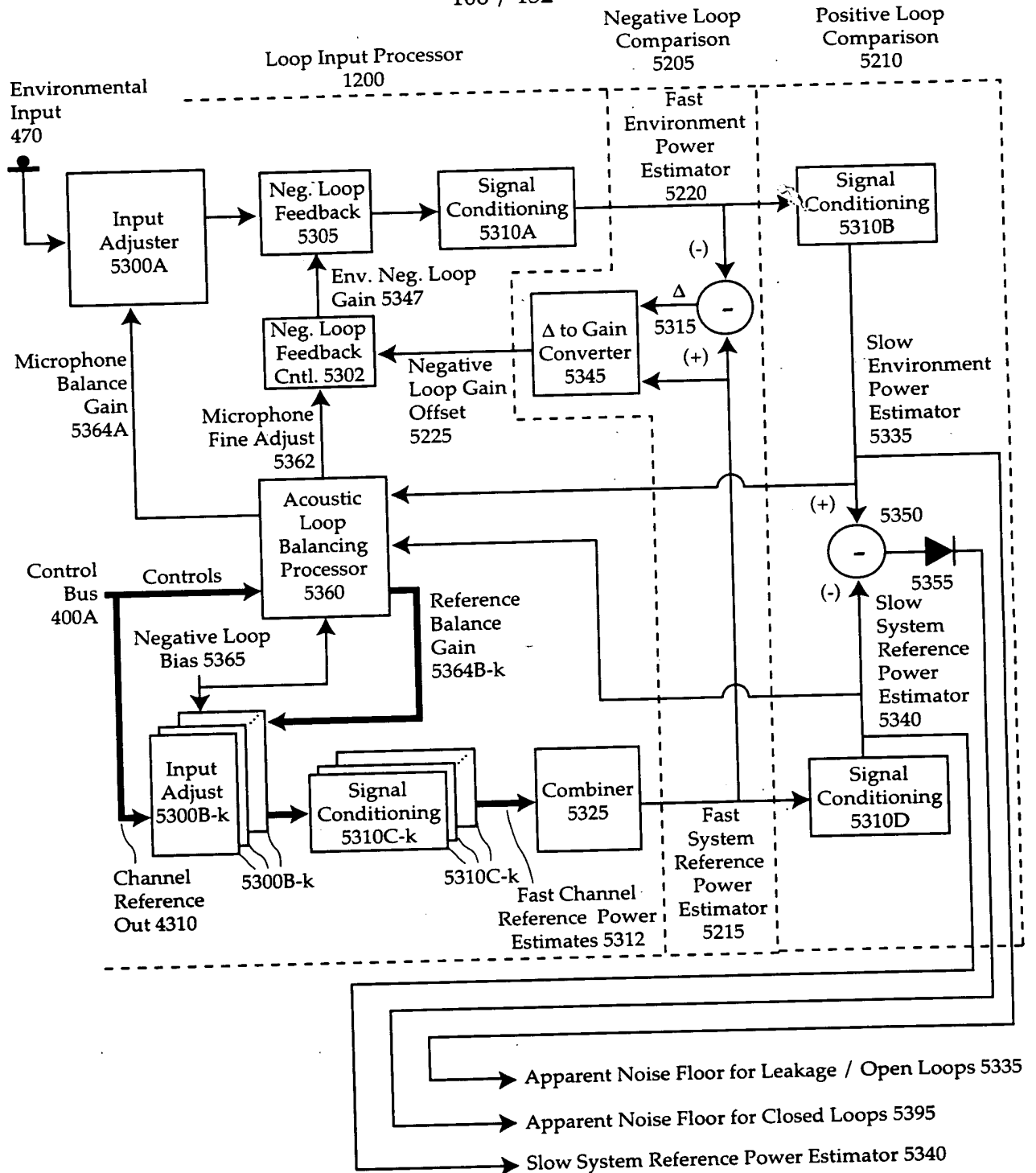


FIG. 53A

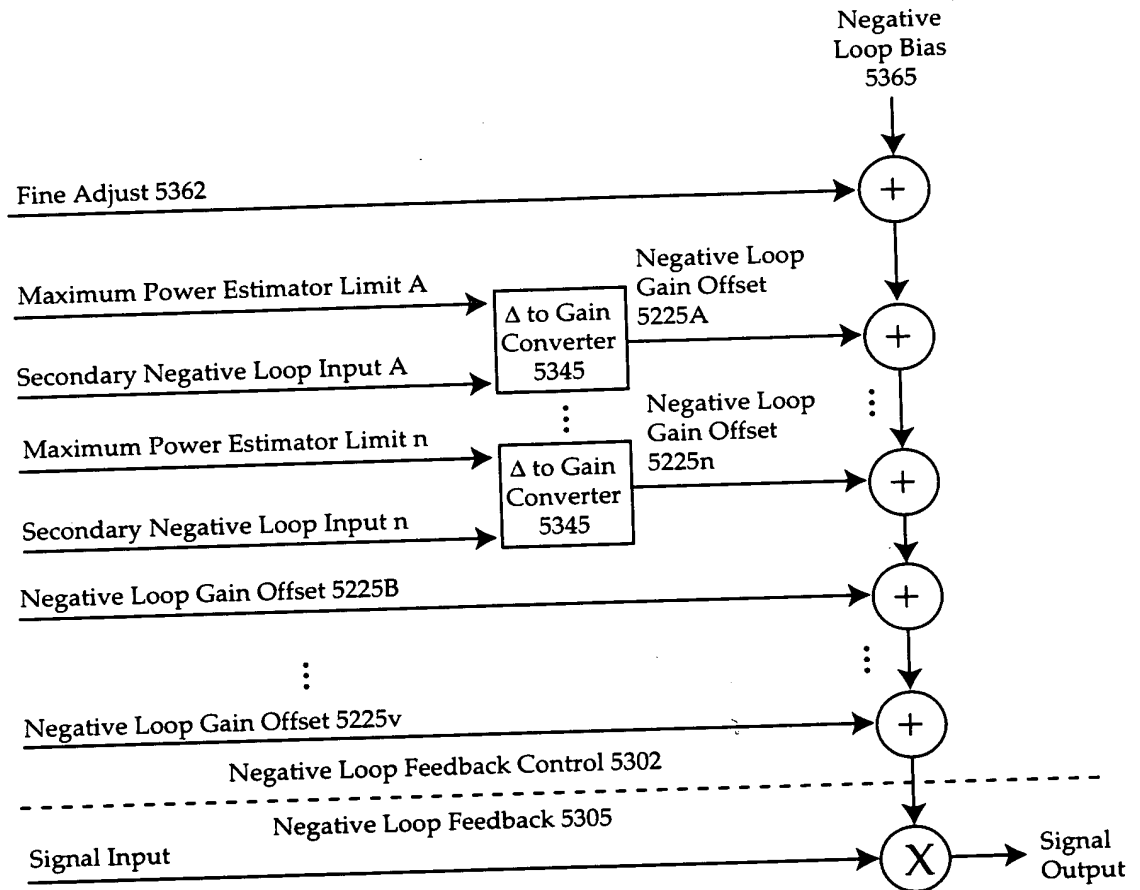


FIG. 53B

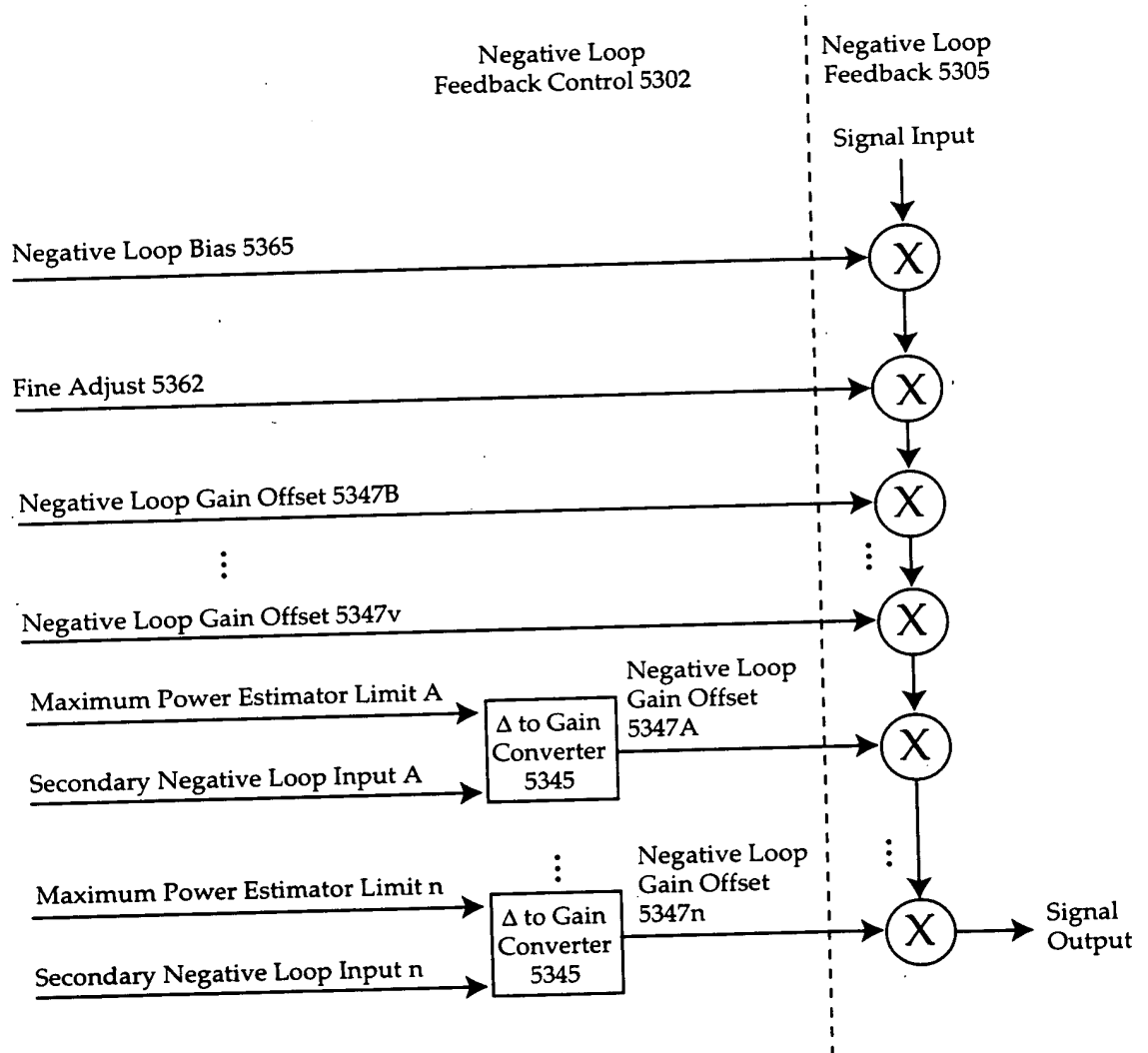


FIG. 53C

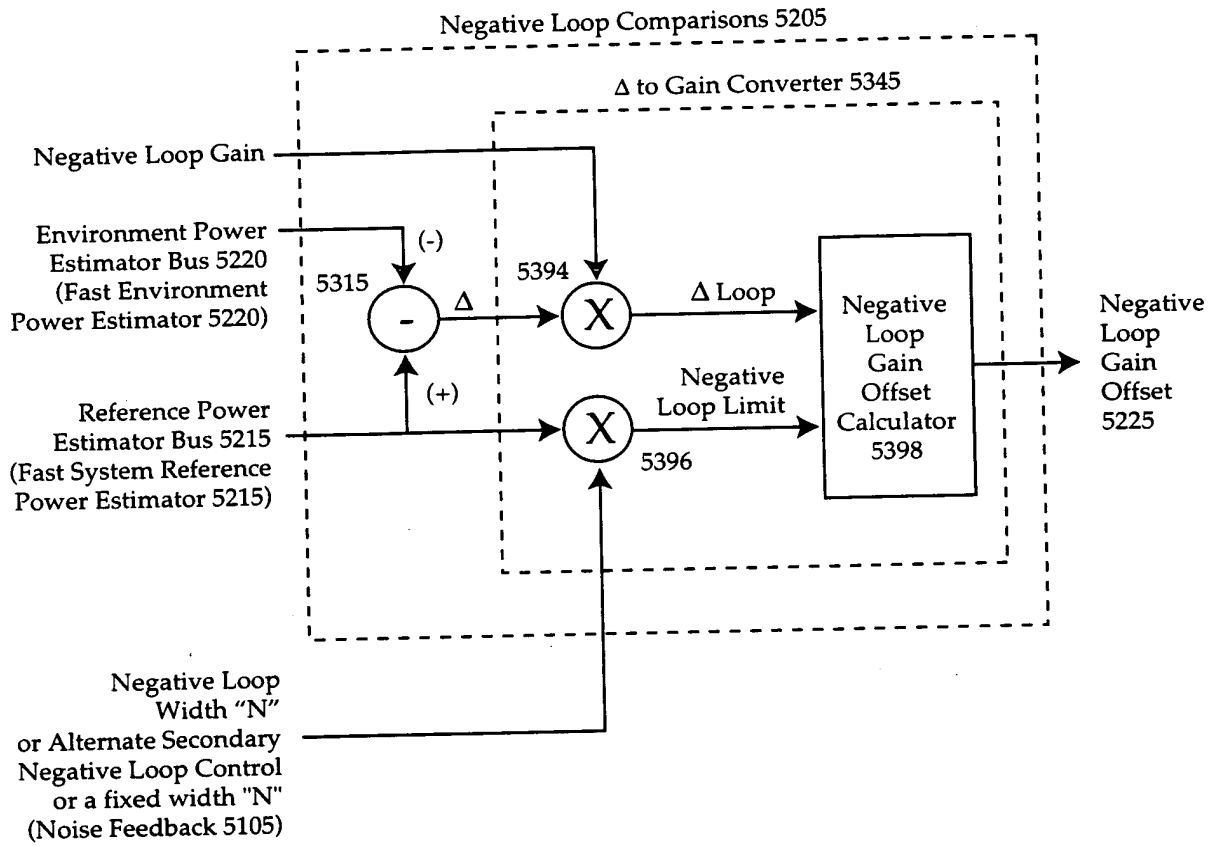


FIG. 53D

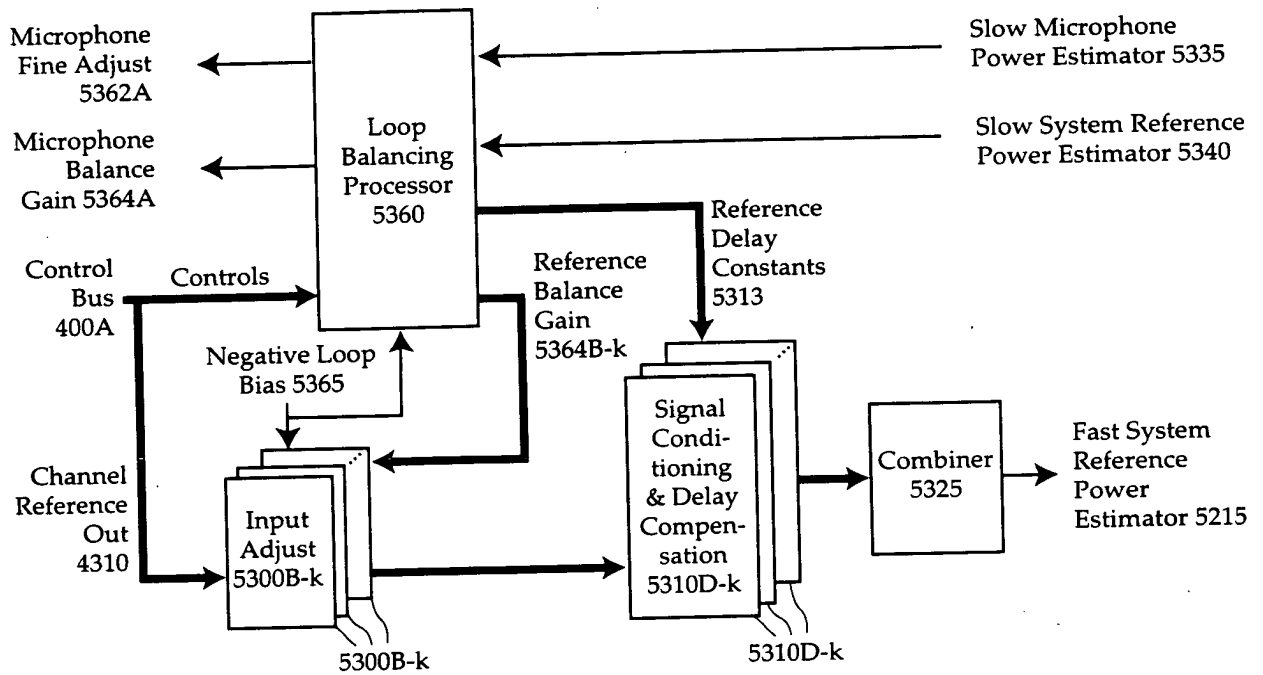


FIG. 53E

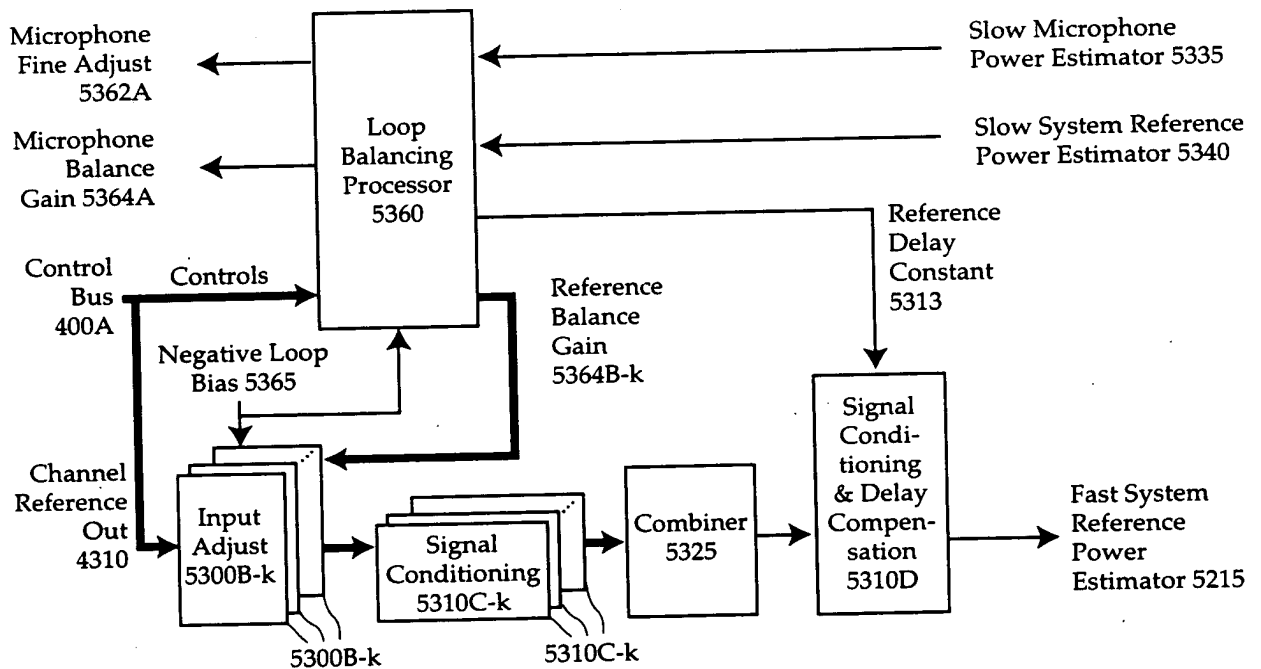


FIG. 53F

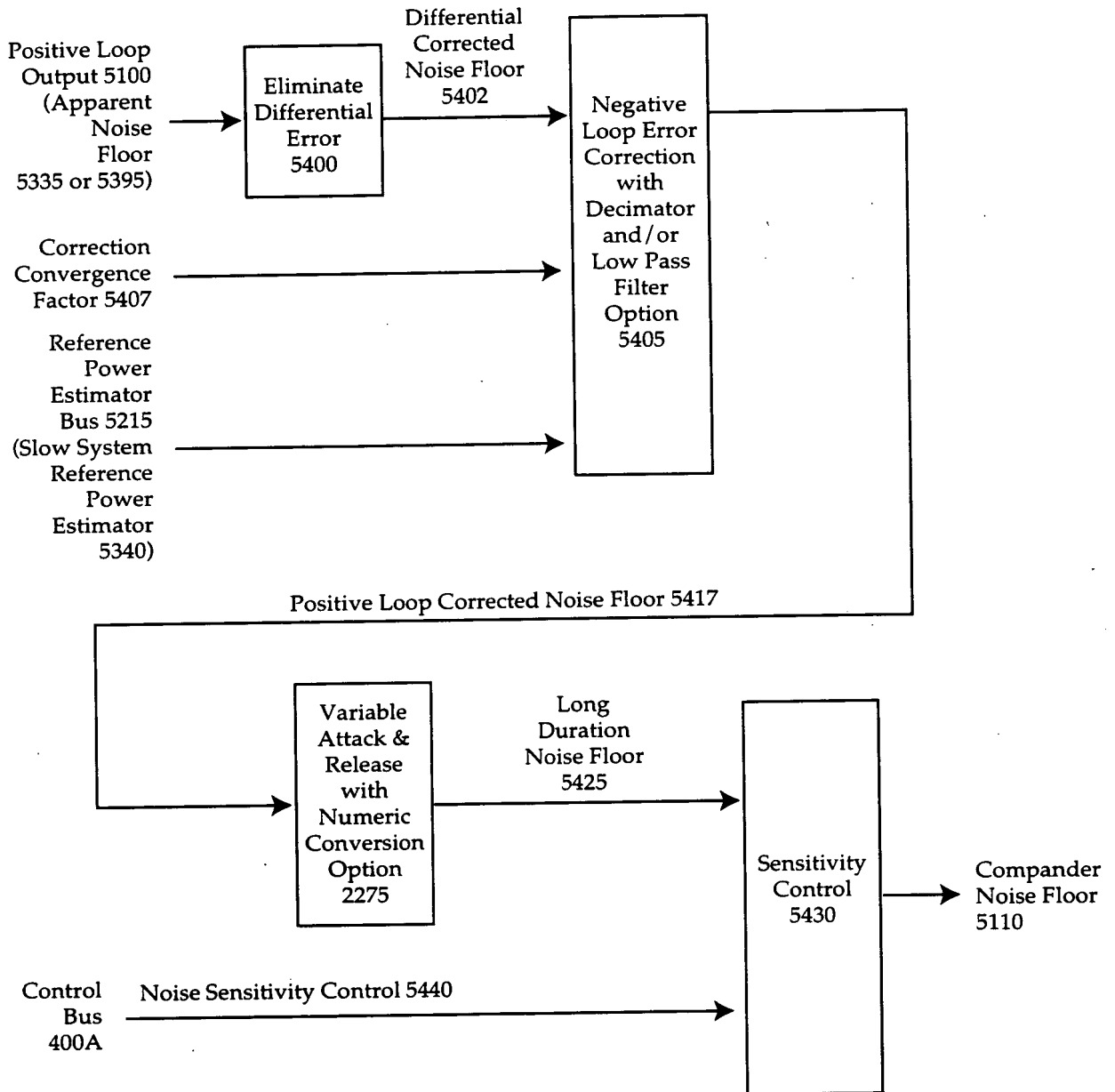


FIG. 54A

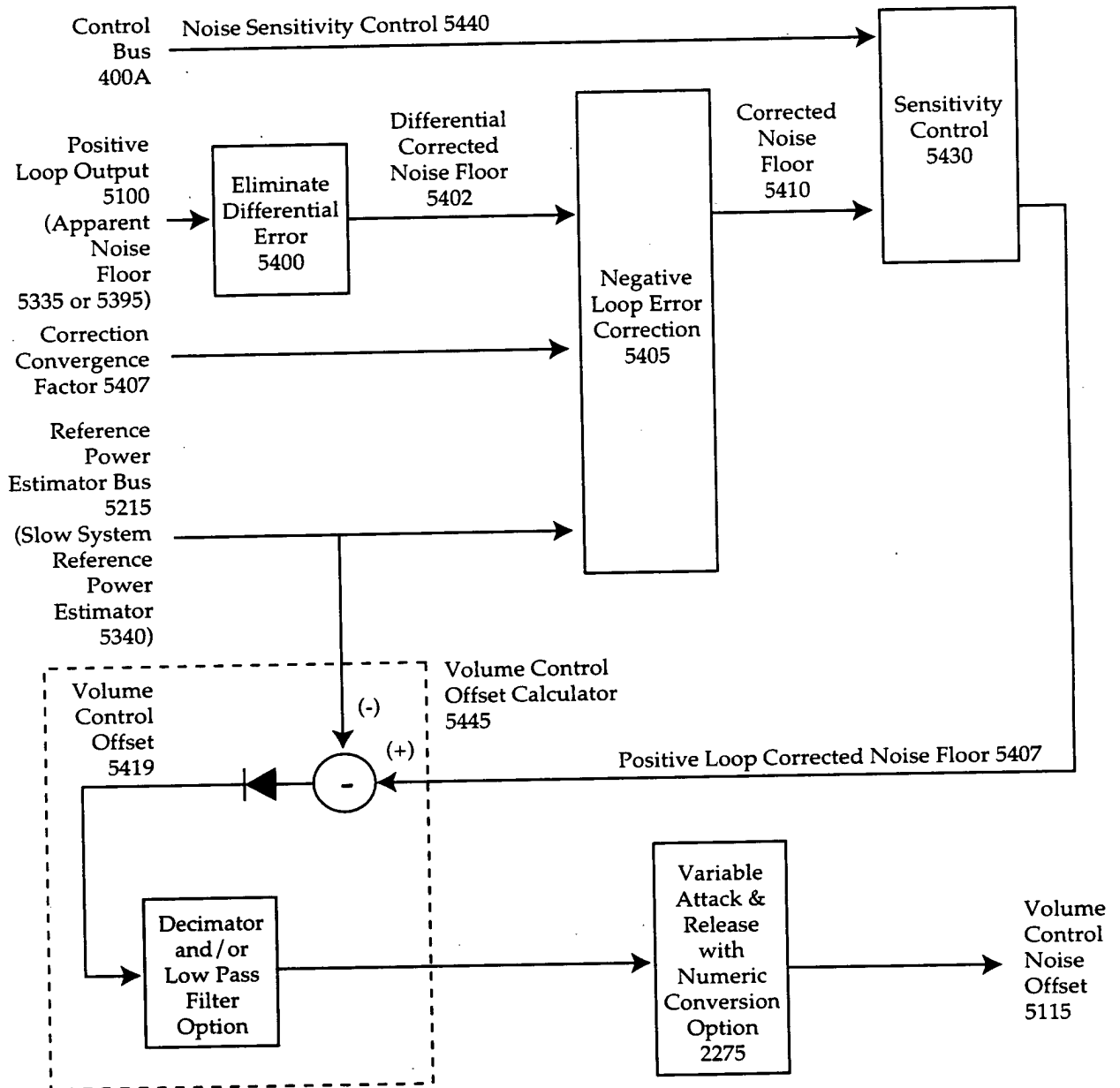


FIG. 54B

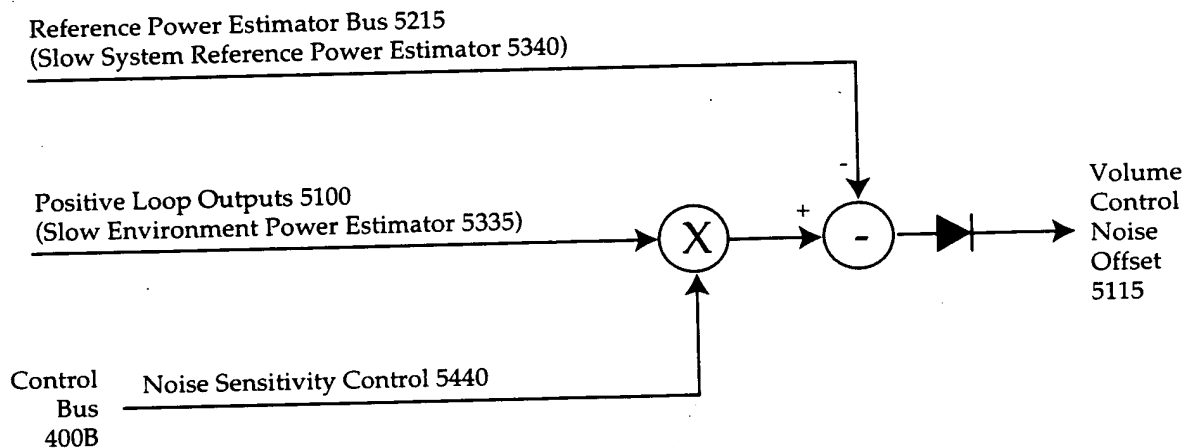


FIG. 54C

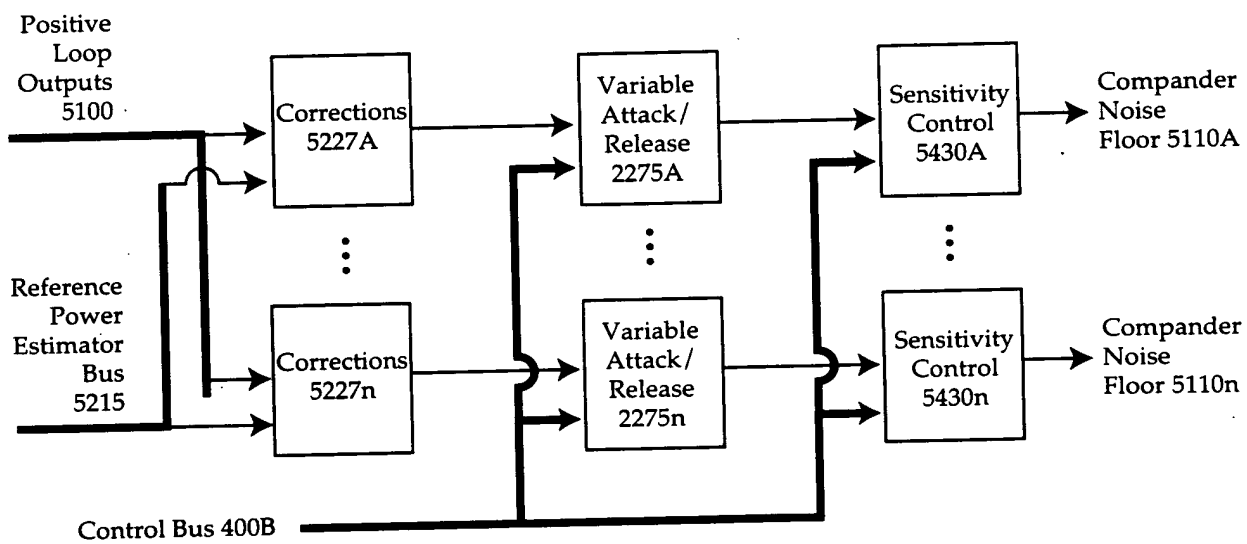


FIG. 54D

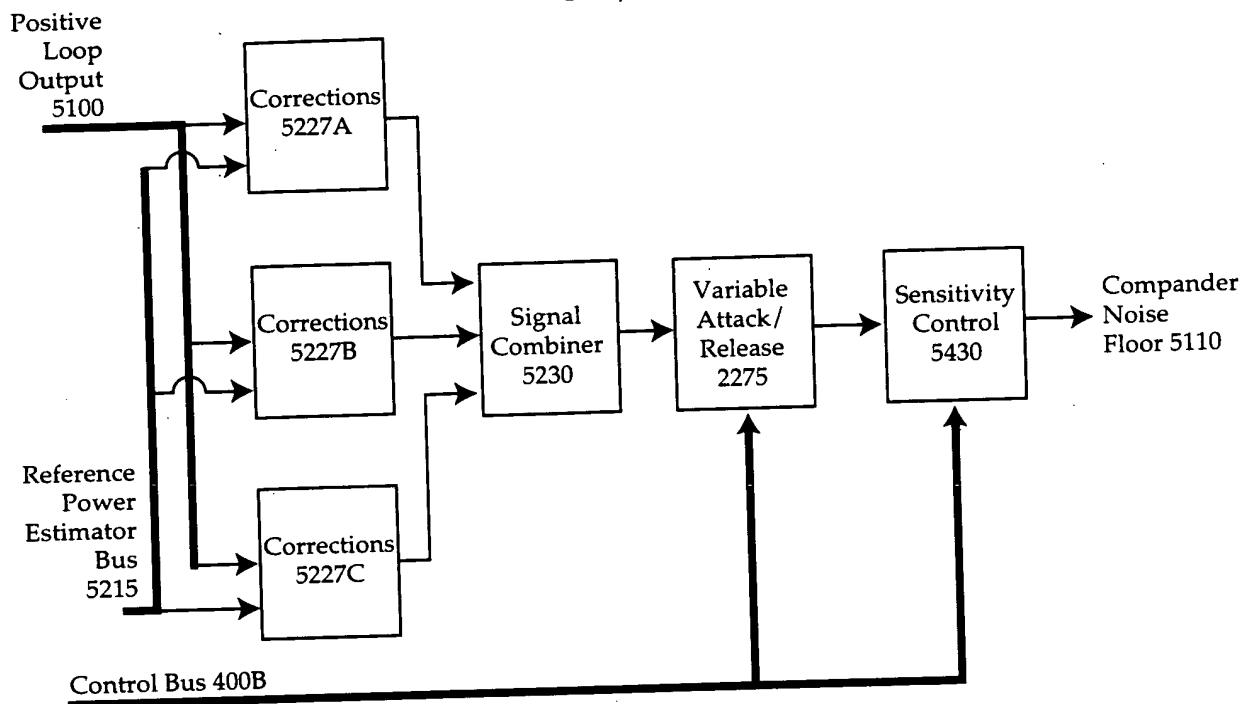


FIG. 54E

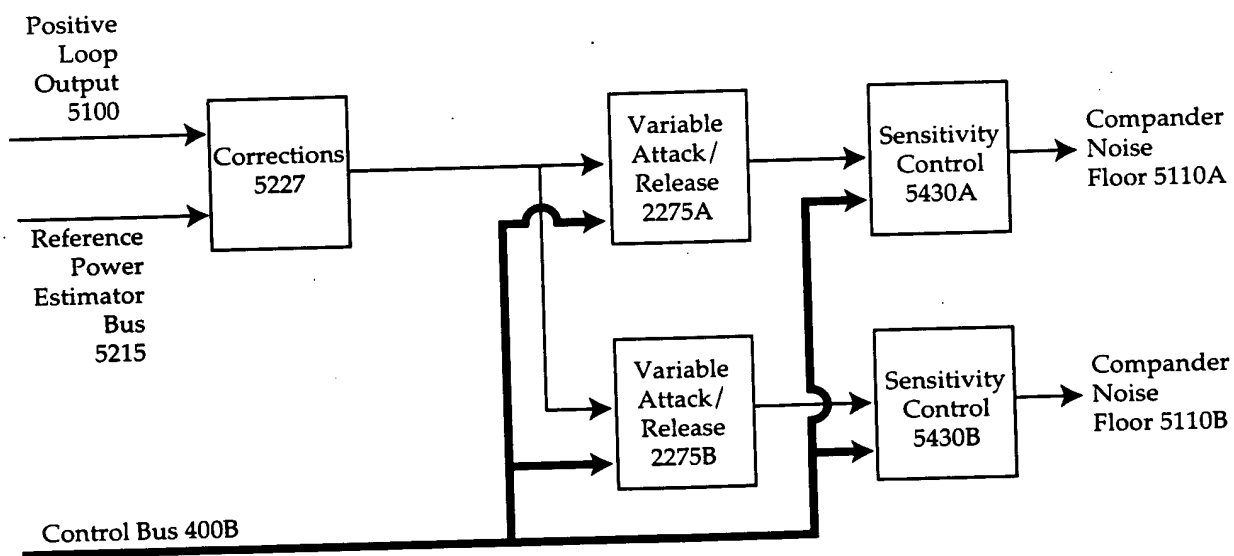


FIG. 54F

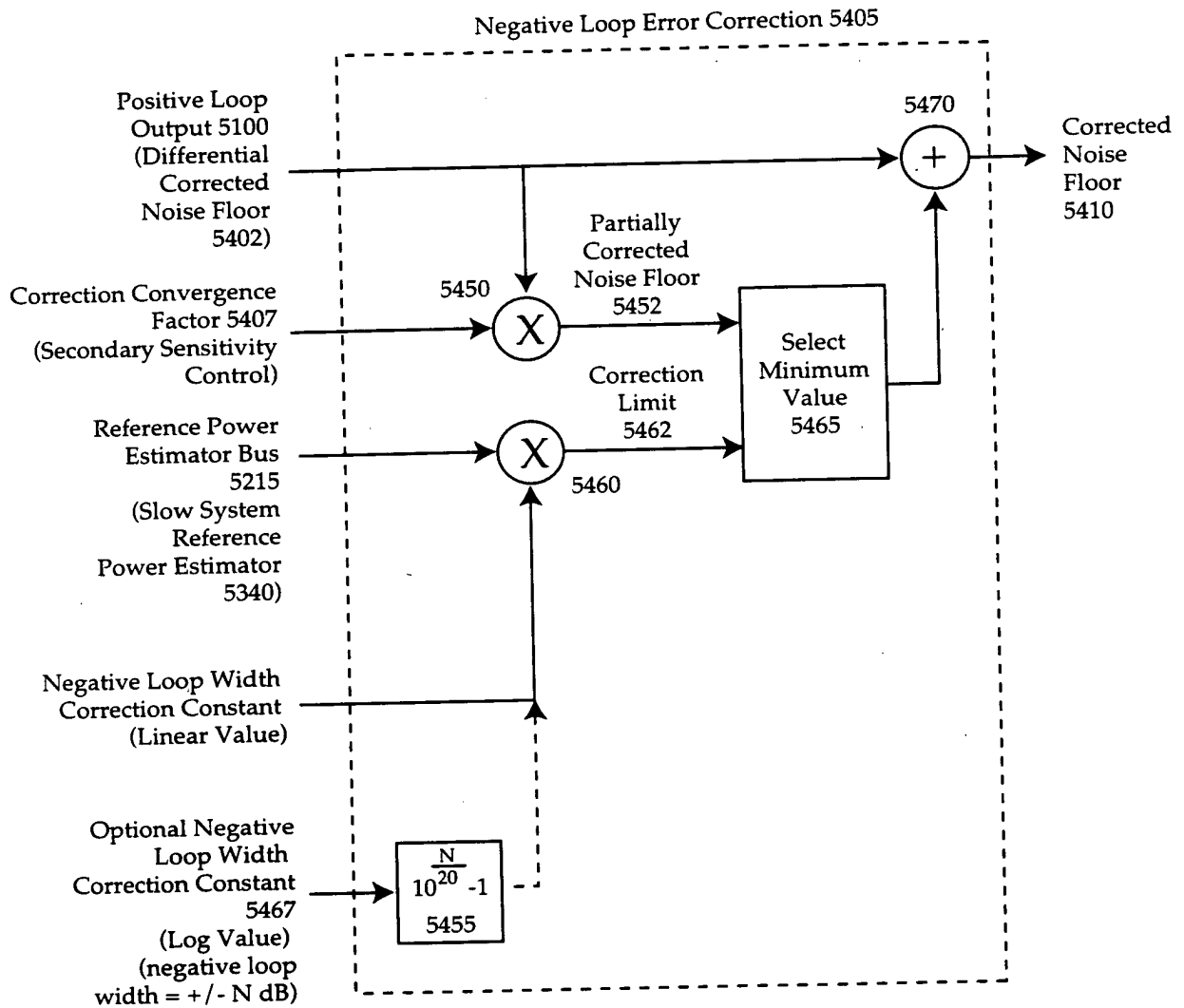


FIG. 54G

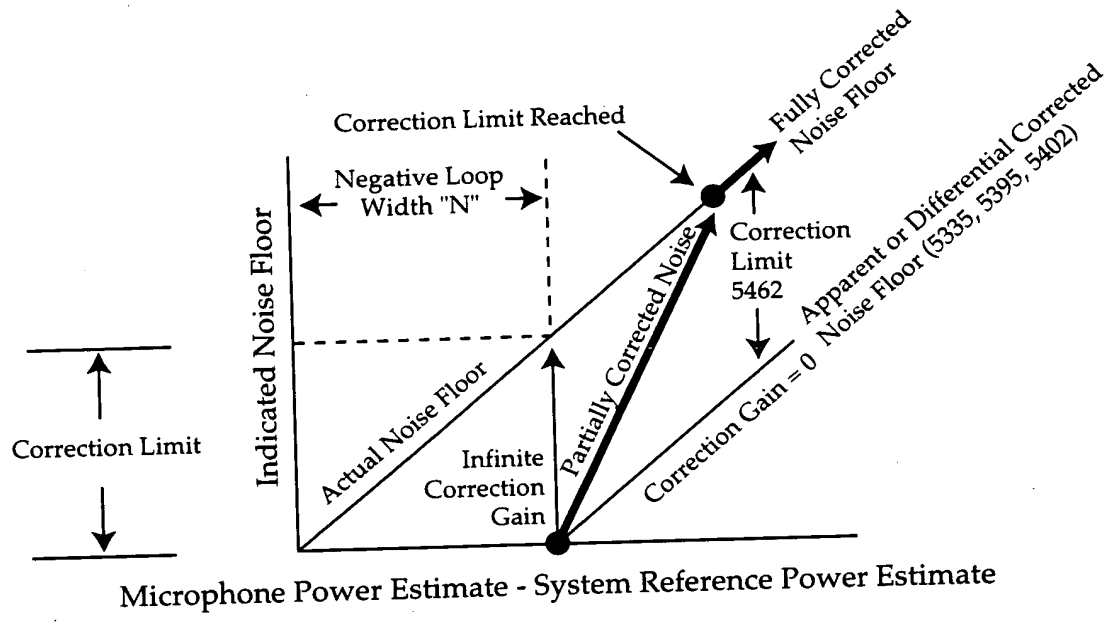


FIG. 54H

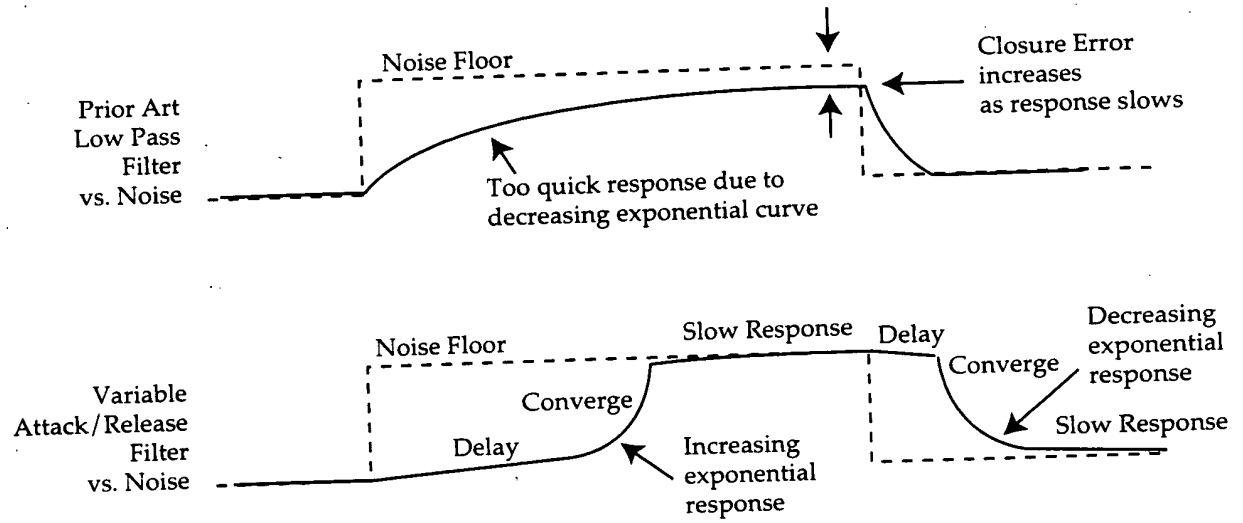


FIG. 55A

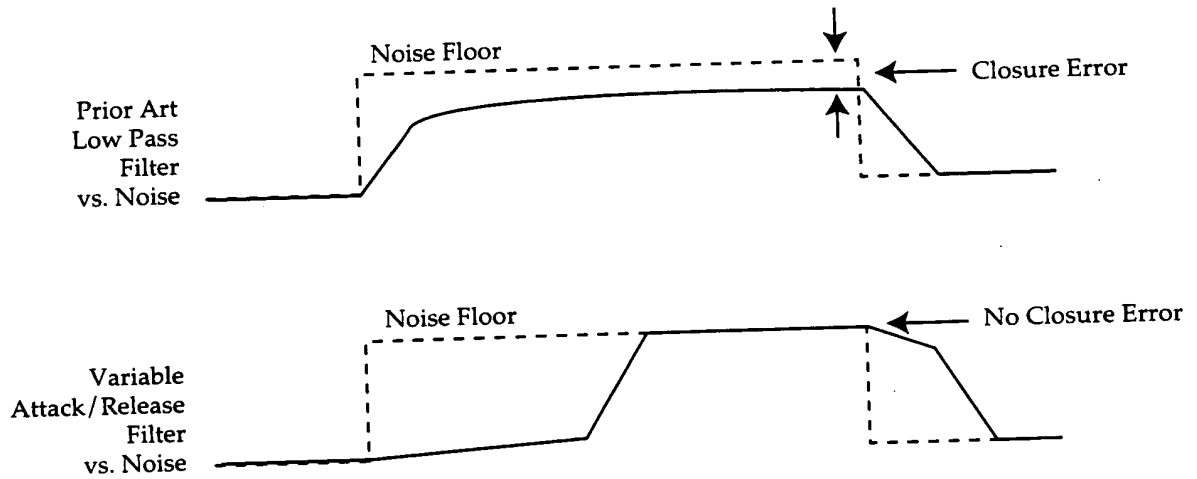
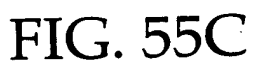


FIG. 55B



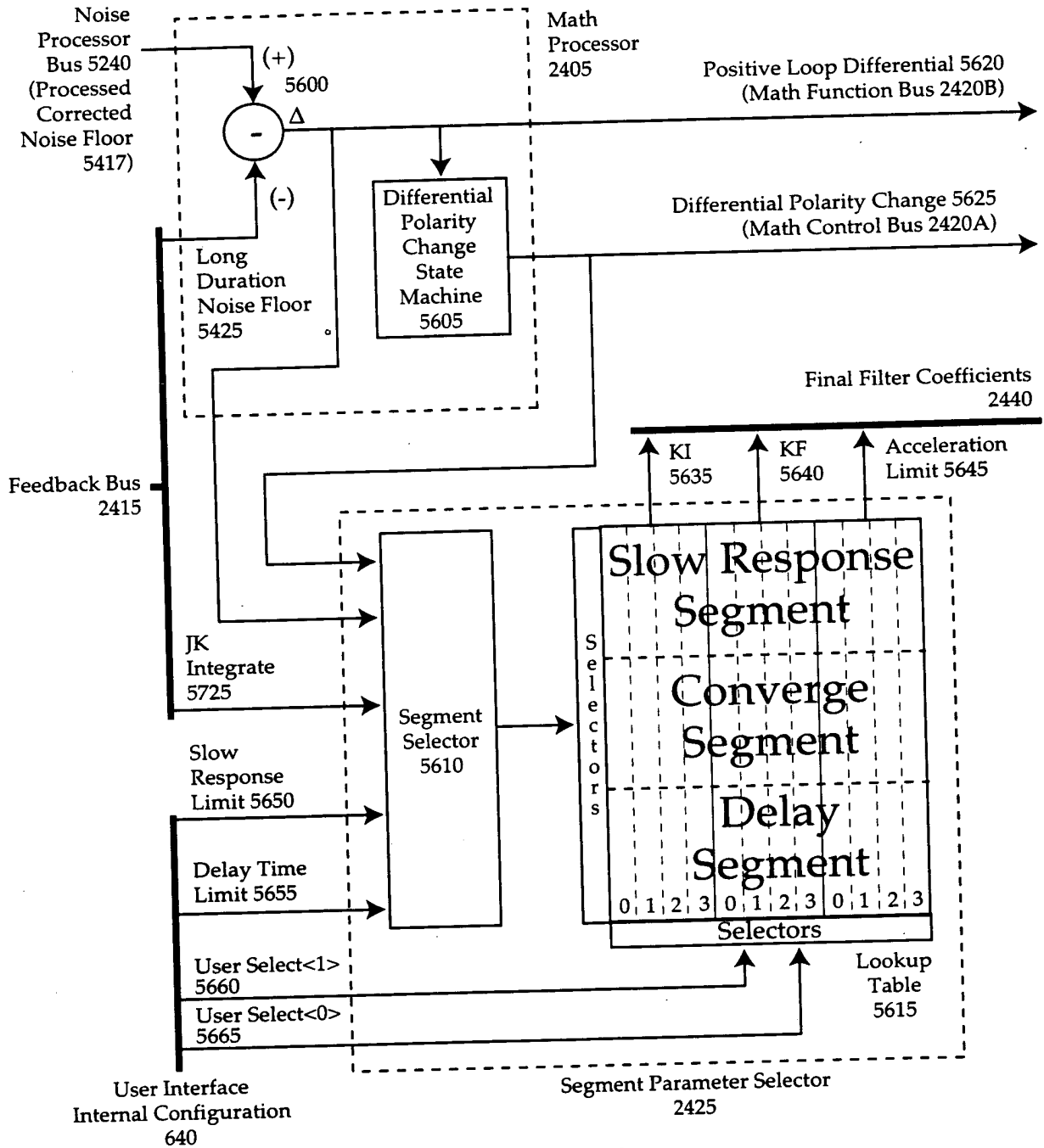


FIG. 56

Differential Polarity Change 5625
(Math Control Bus 2420A)

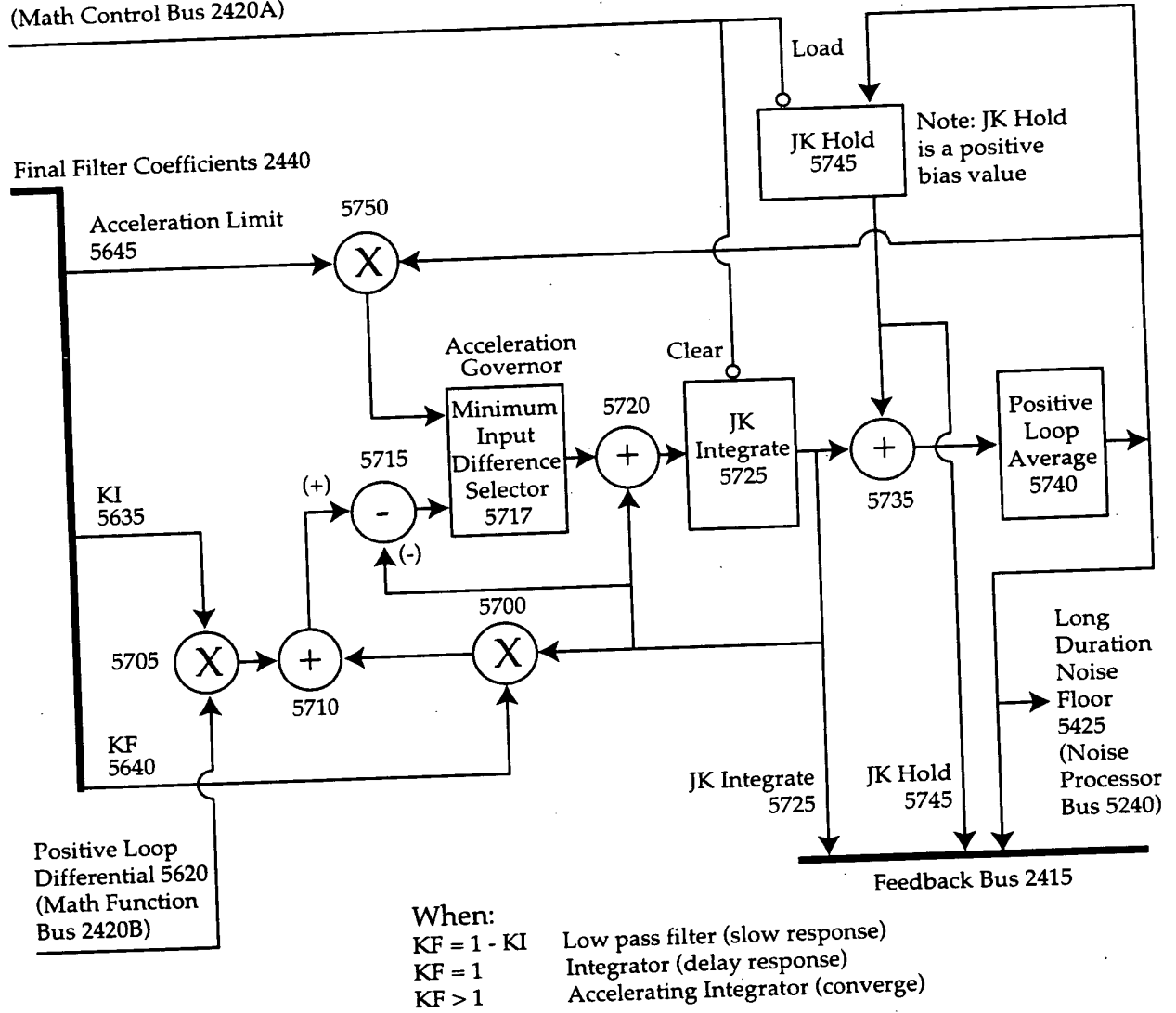


FIG. 57A

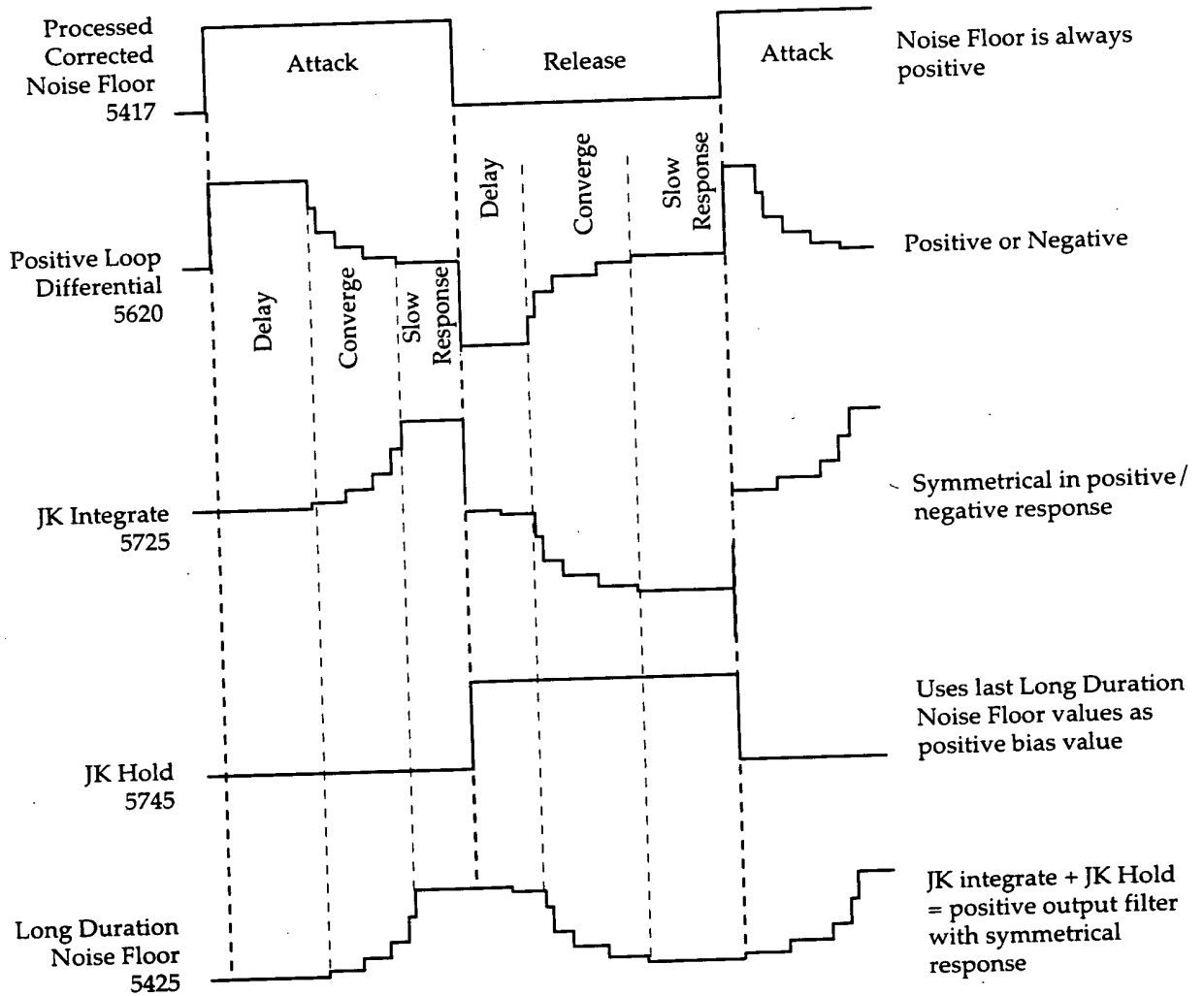


FIG. 57B

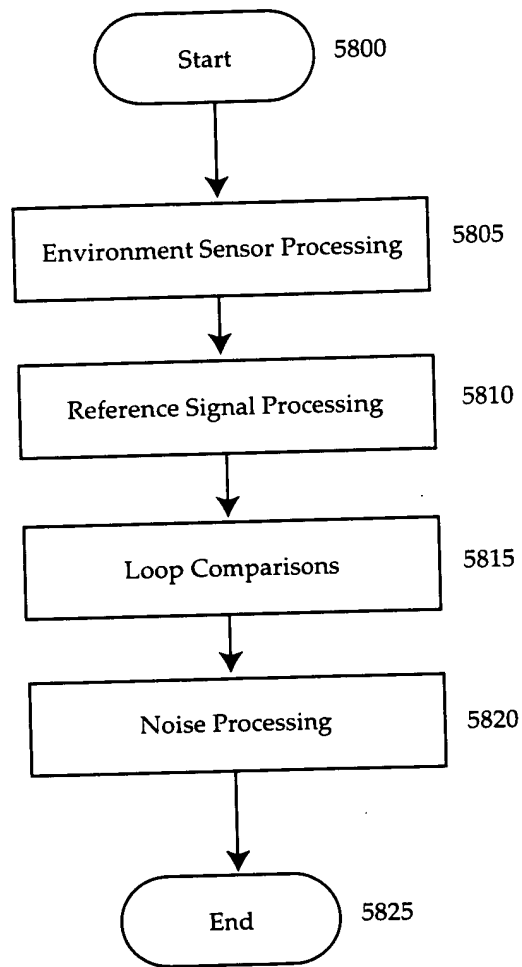


FIG. 58

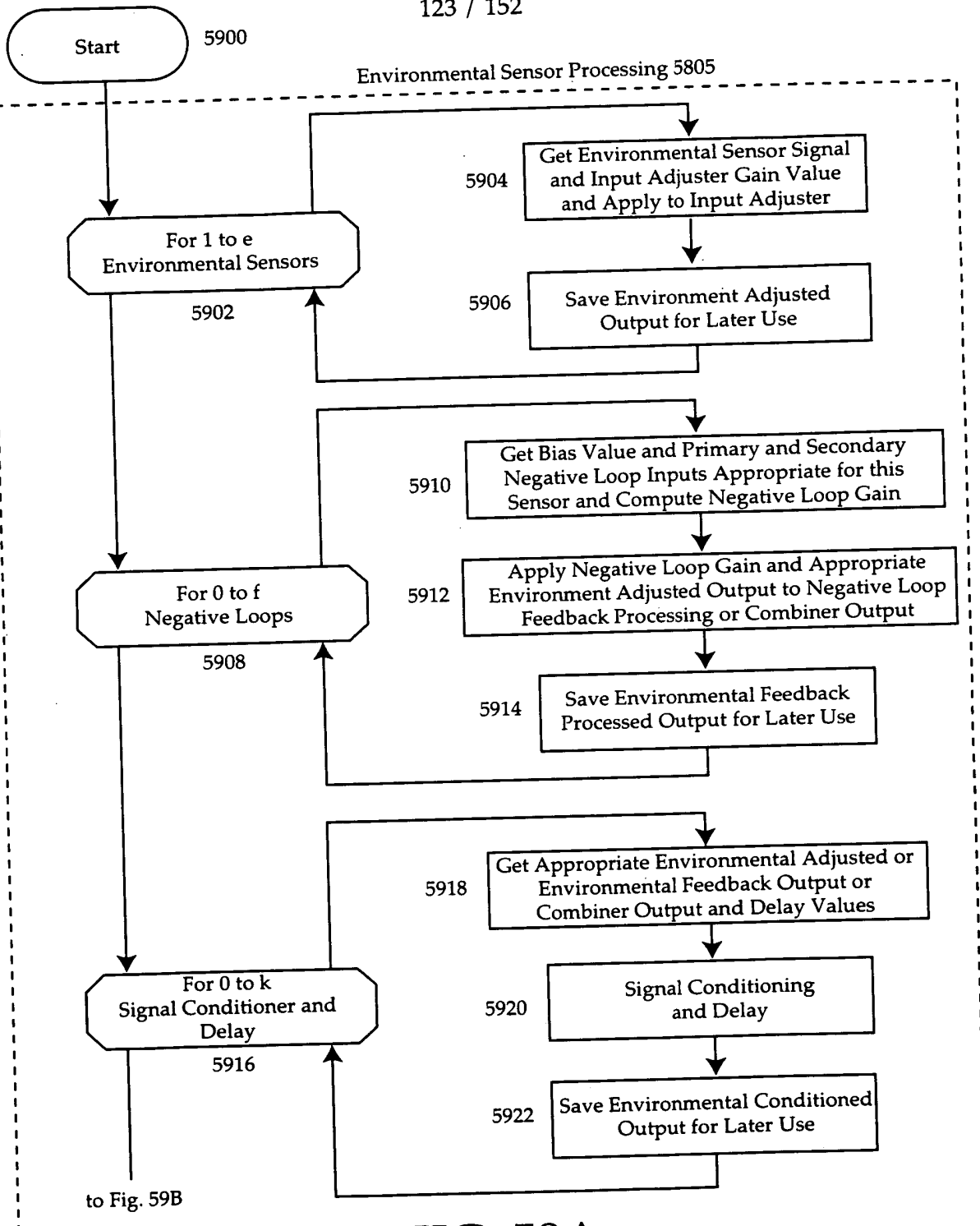


FIG. 59A

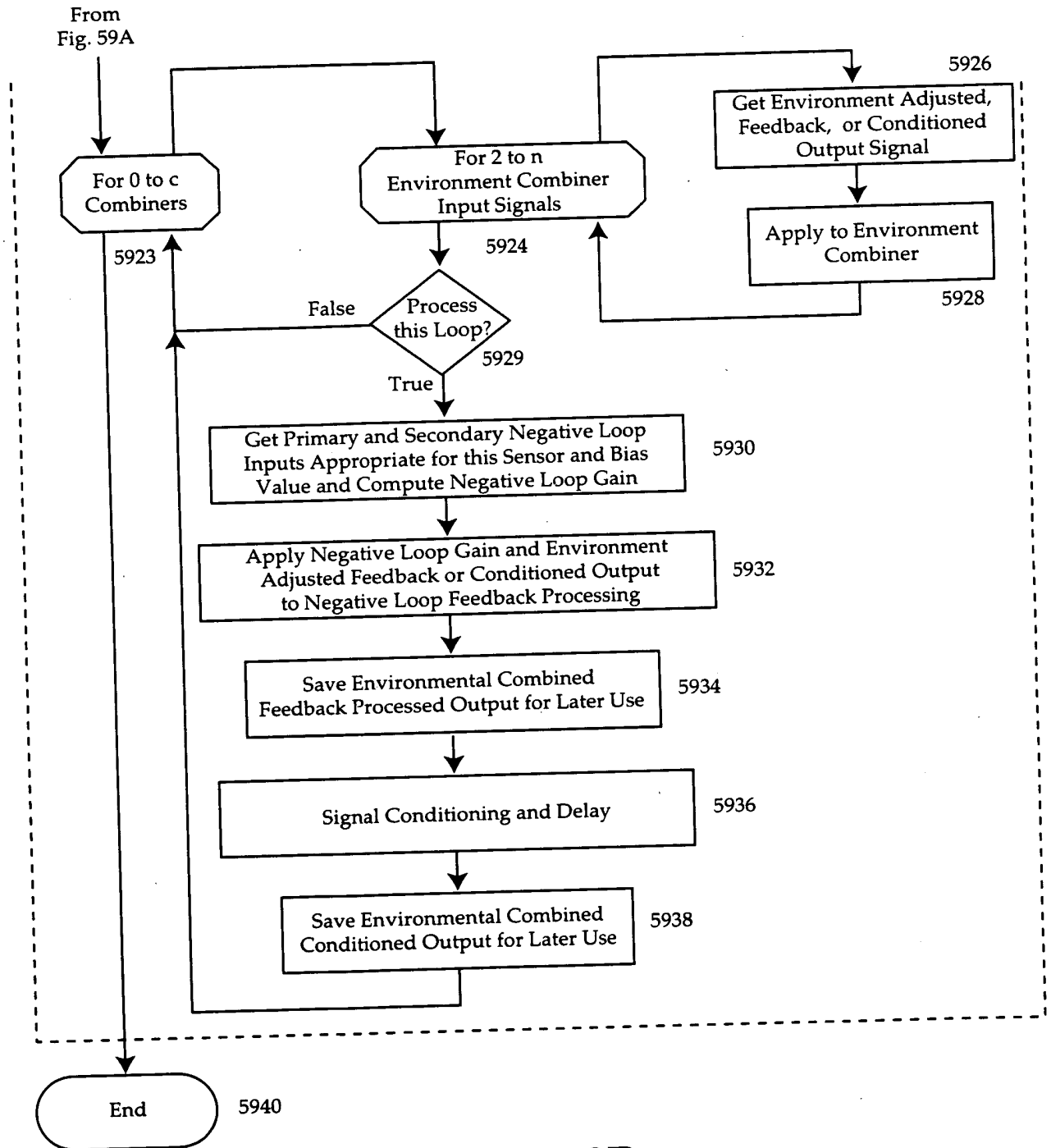


FIG. 59B

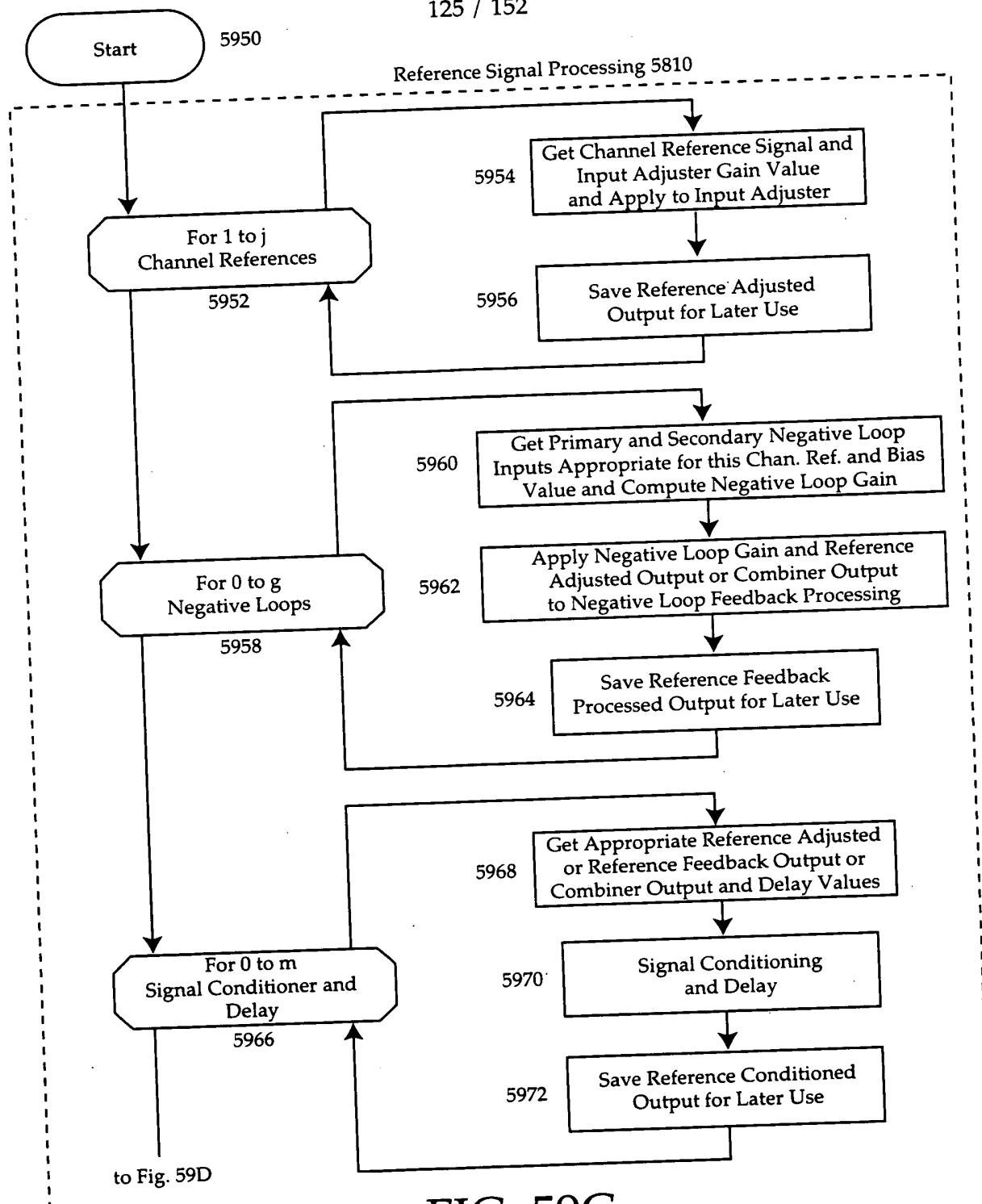


FIG. 59C

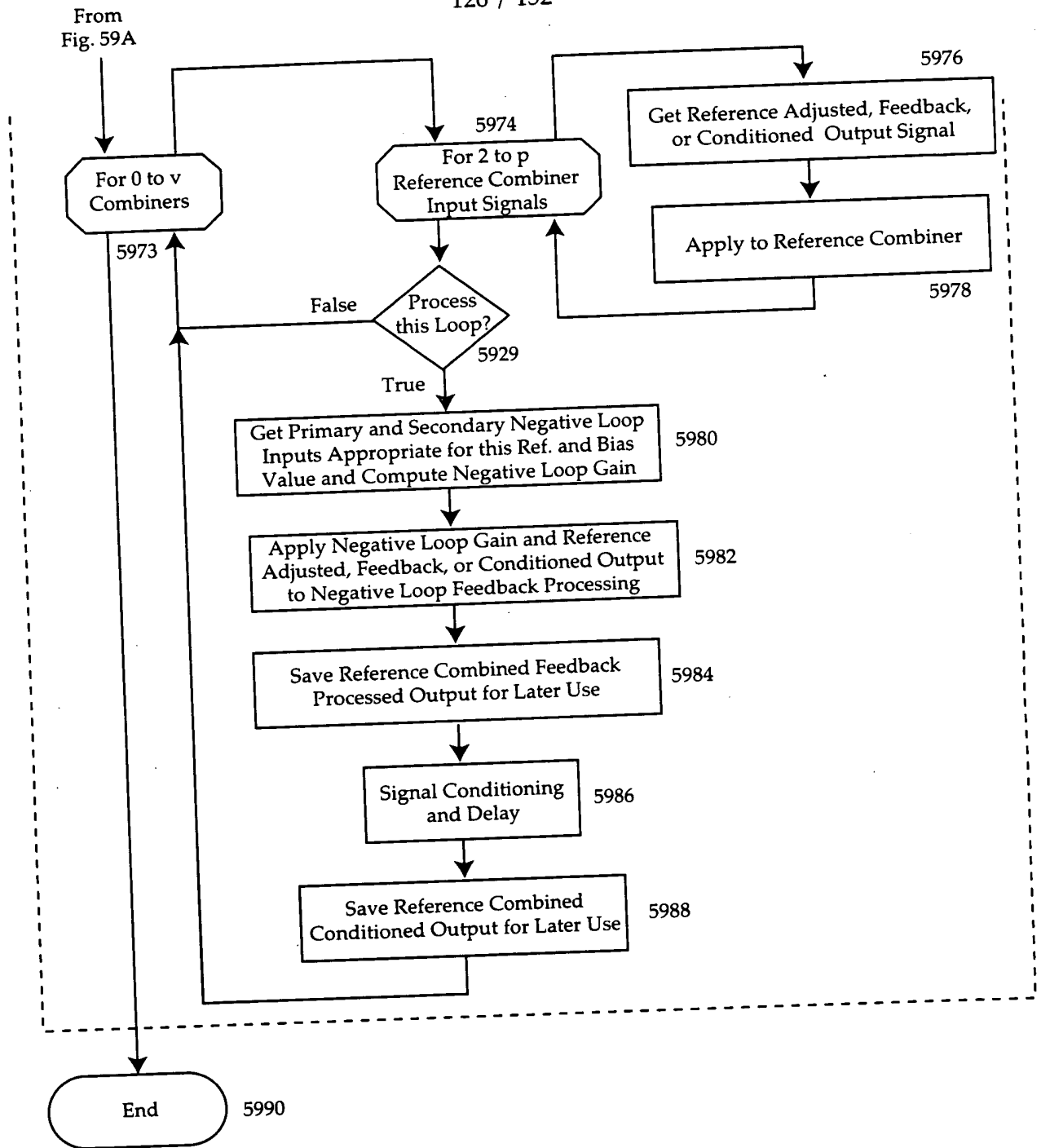


FIG. 59D

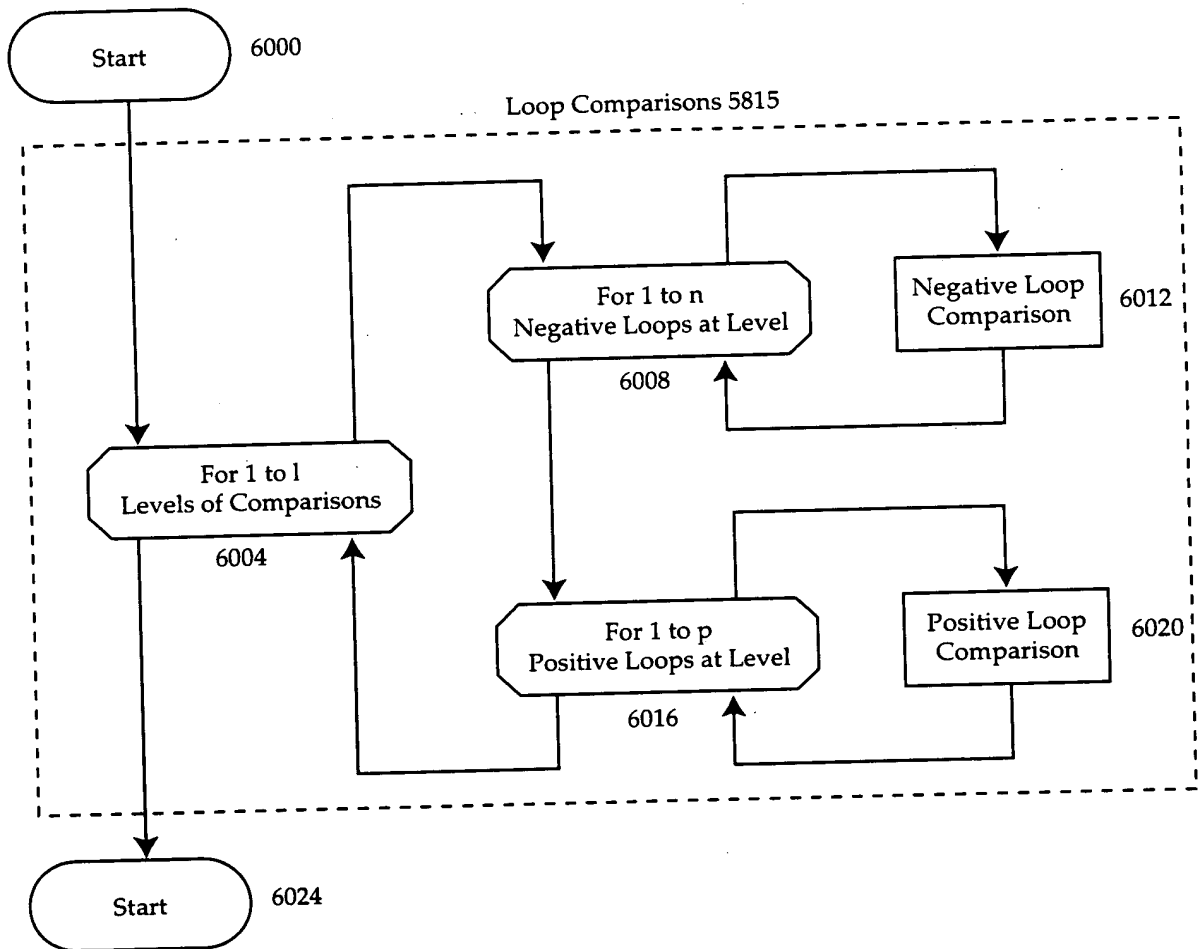


FIG. 60A

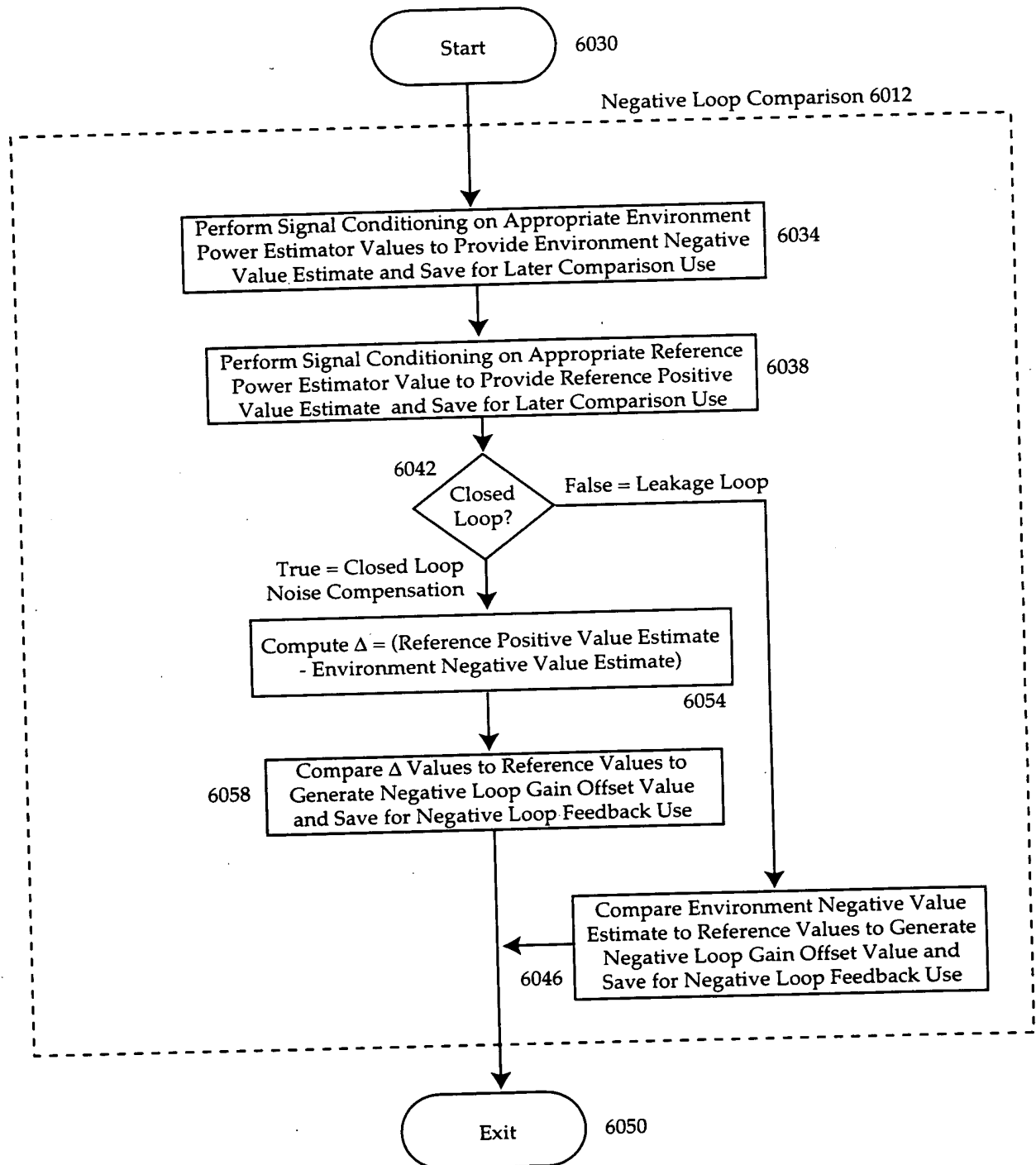


FIG. 60B

129 / 152

6060

Start

Positive Loop Comparison 6020

Perform Signal Conditioning on Appropriate Environment
Power Estimator Value to Provide Environment Positive
Value Estimate and Save for Later Comparison Use

6064

Perform Signal Conditioning on Appropriate Reference
Power Estimator Value to Provide Reference Negative
Value Estimate and Save for Later Comparison Use

6068

6072

Closed
Loop?

False

True = Closed Loop
Noise Compensation

6080

Compute Δ = Environment Positive Value Estimate
- Reference Negative Value Estimate

6084

$\Delta > 0$?

True

False

$\Delta = 0$
(No Noise)

6088

Exit

6076

FIG. 60C

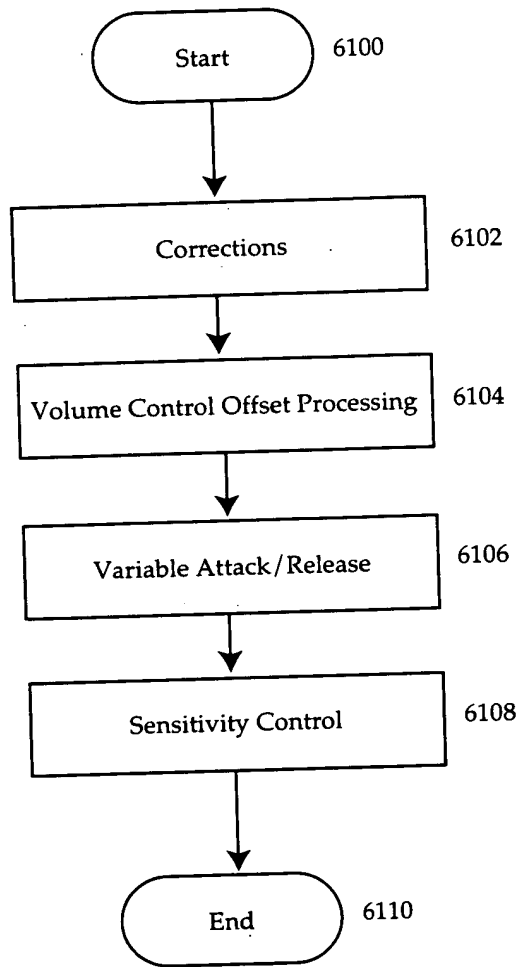


FIG. 61A

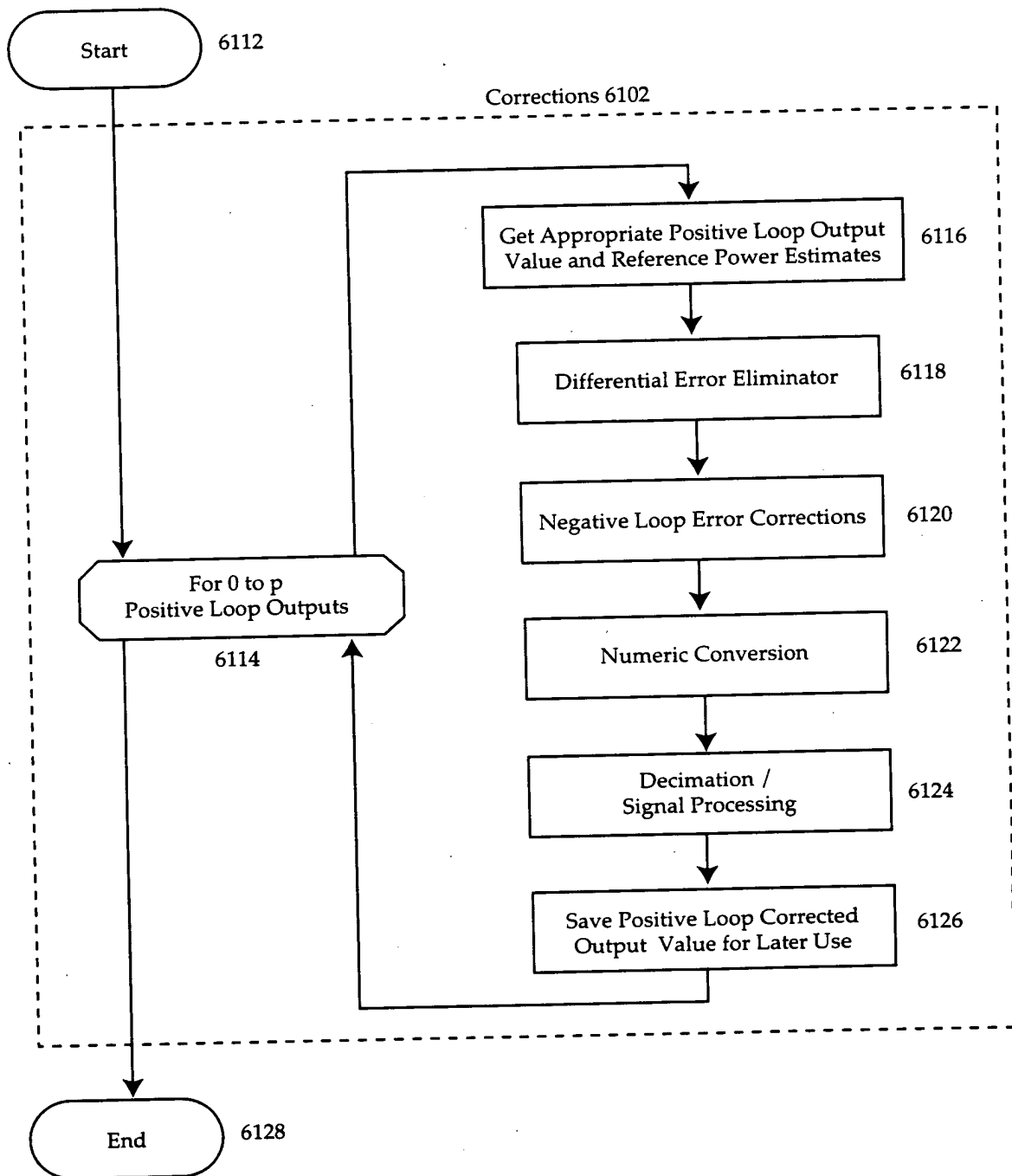


FIG. 61B

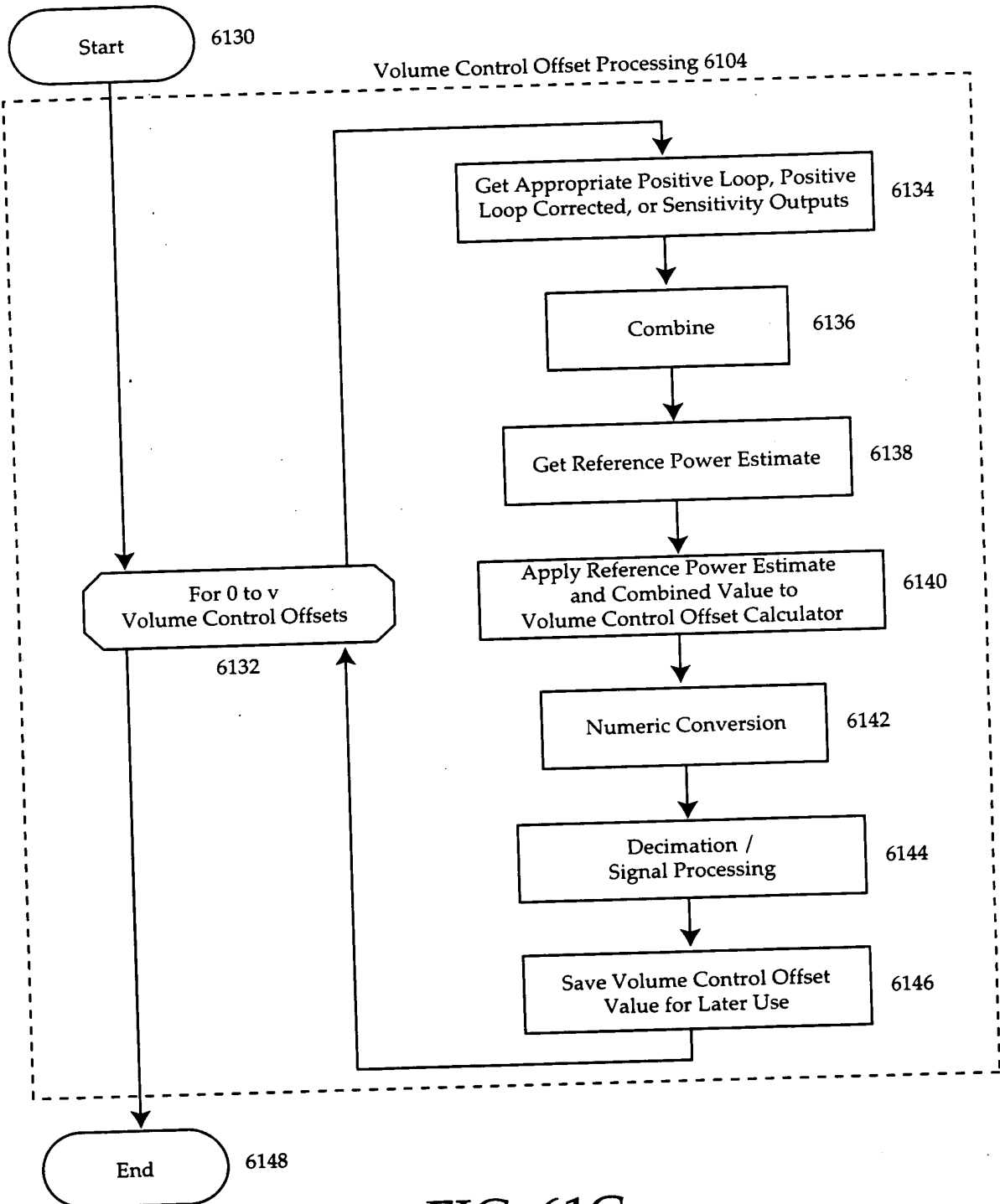


FIG. 61C

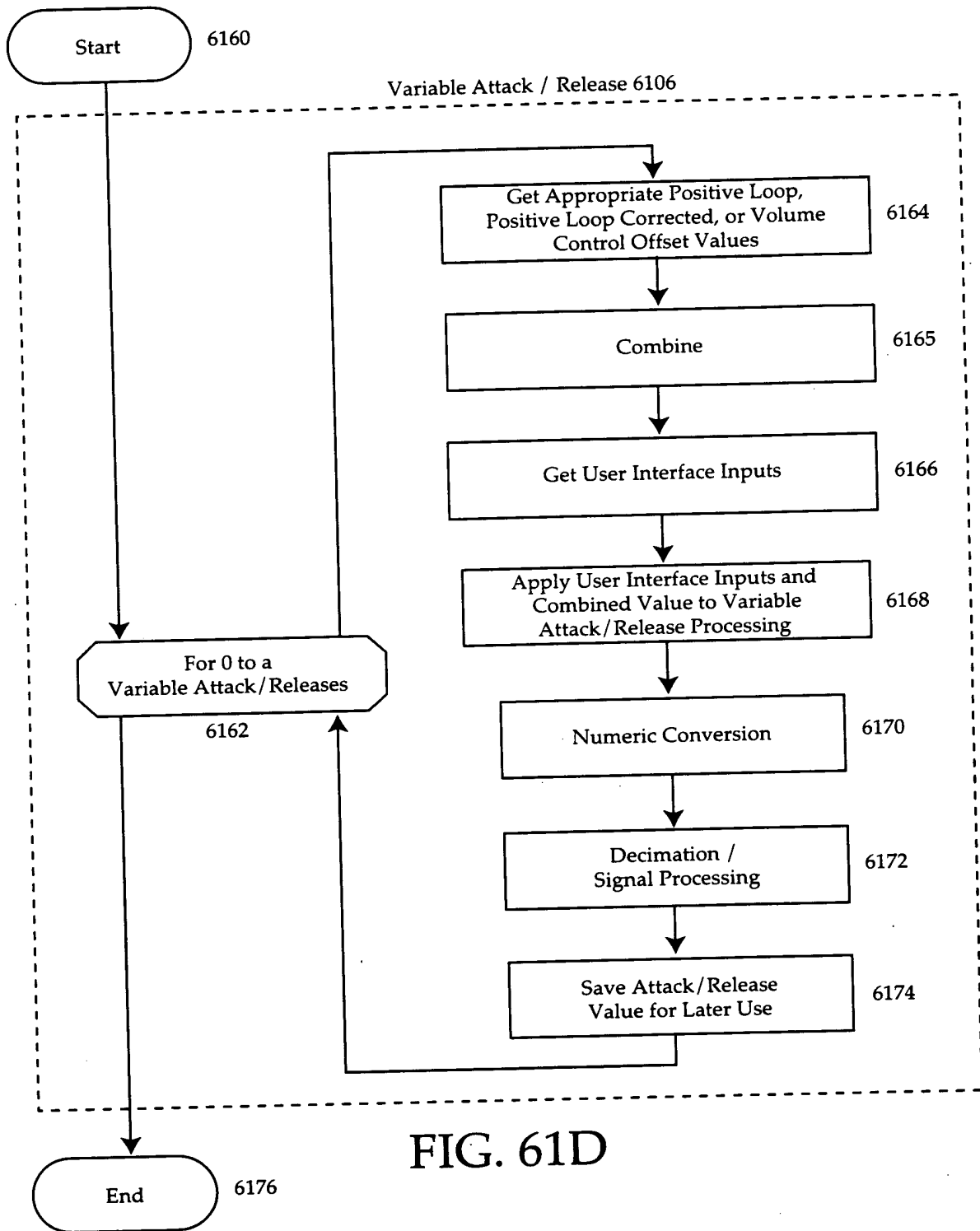


FIG. 61D

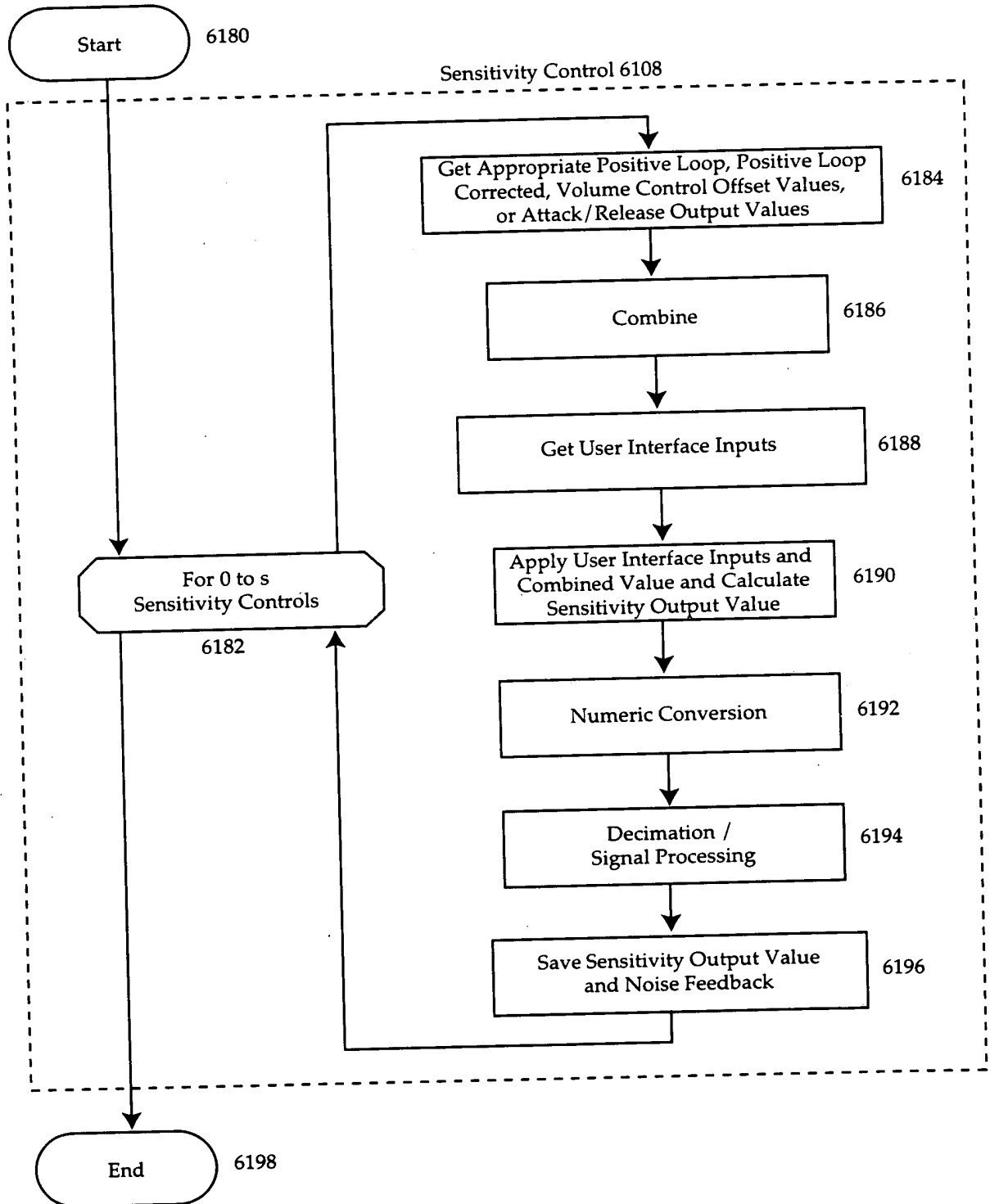
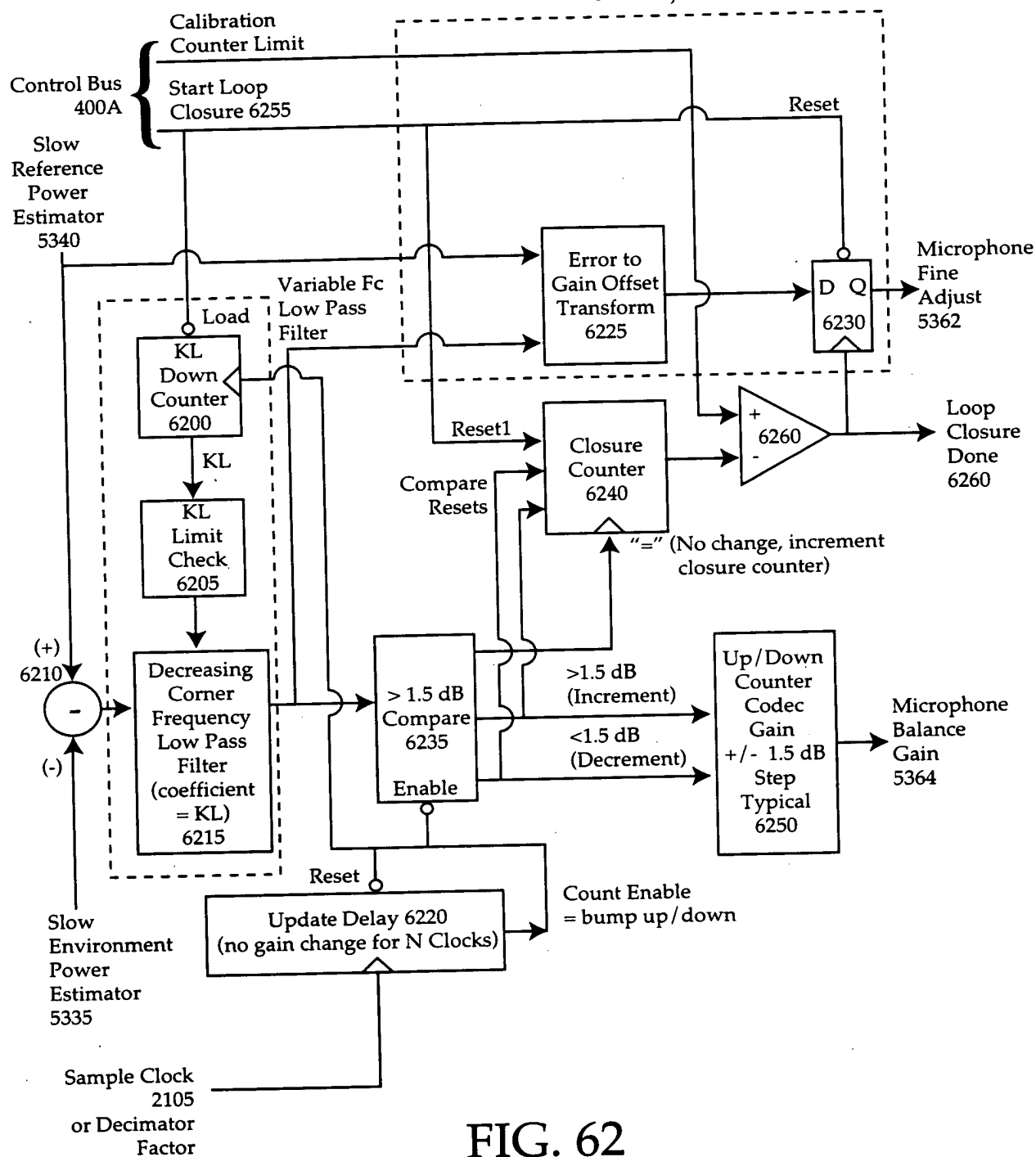


FIG. 61E



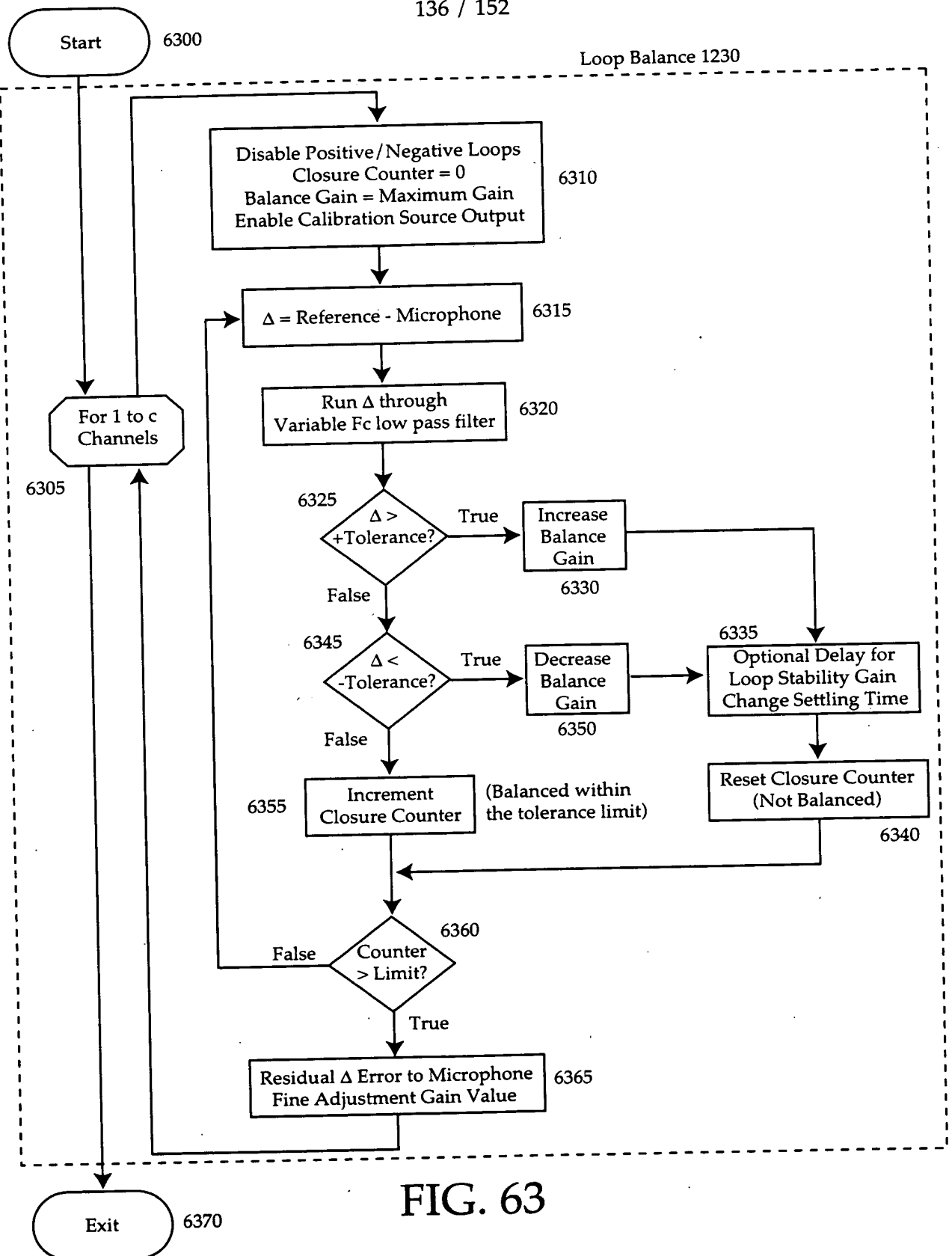


FIG. 63

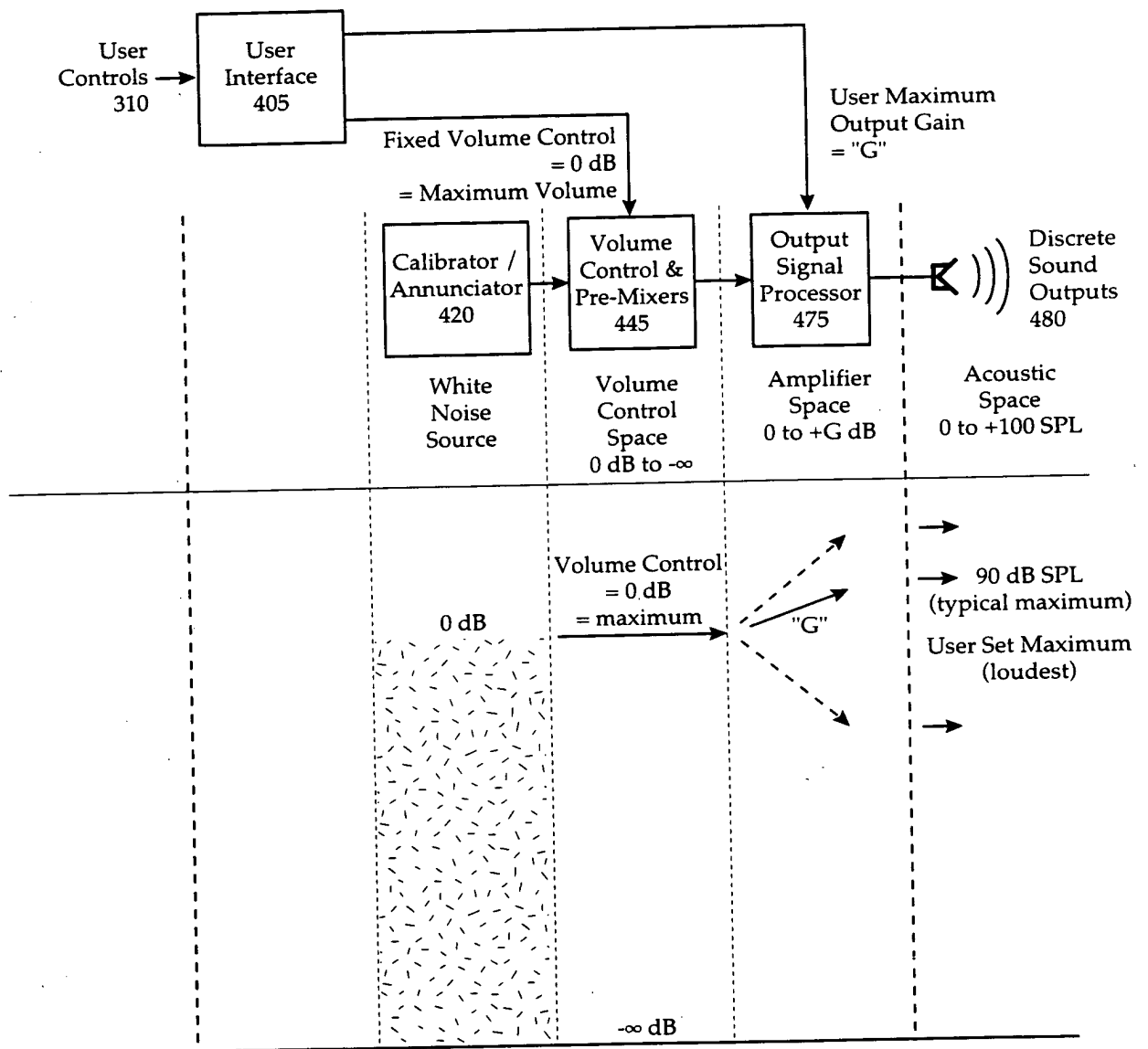


FIG. 64

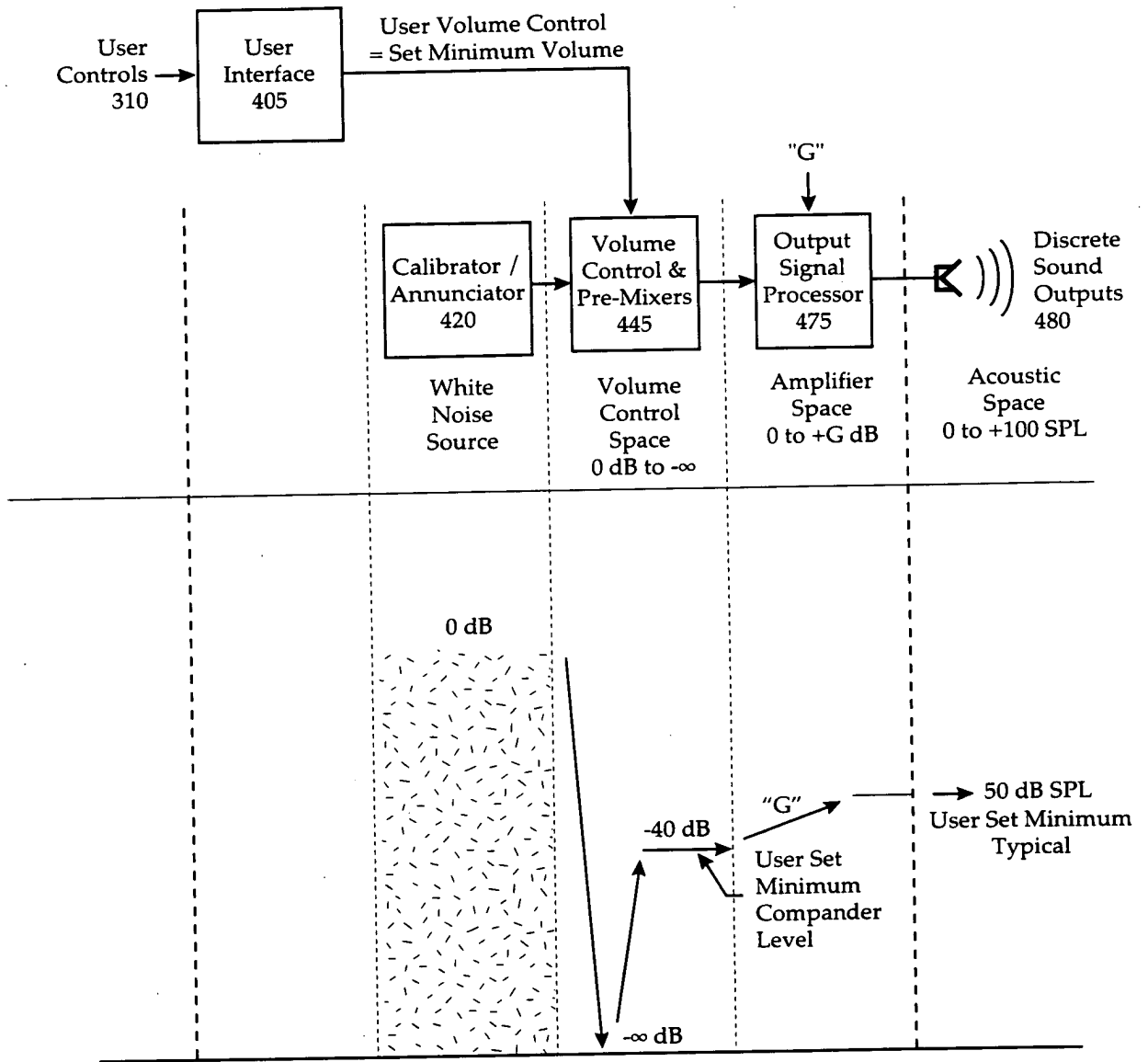


FIG. 65

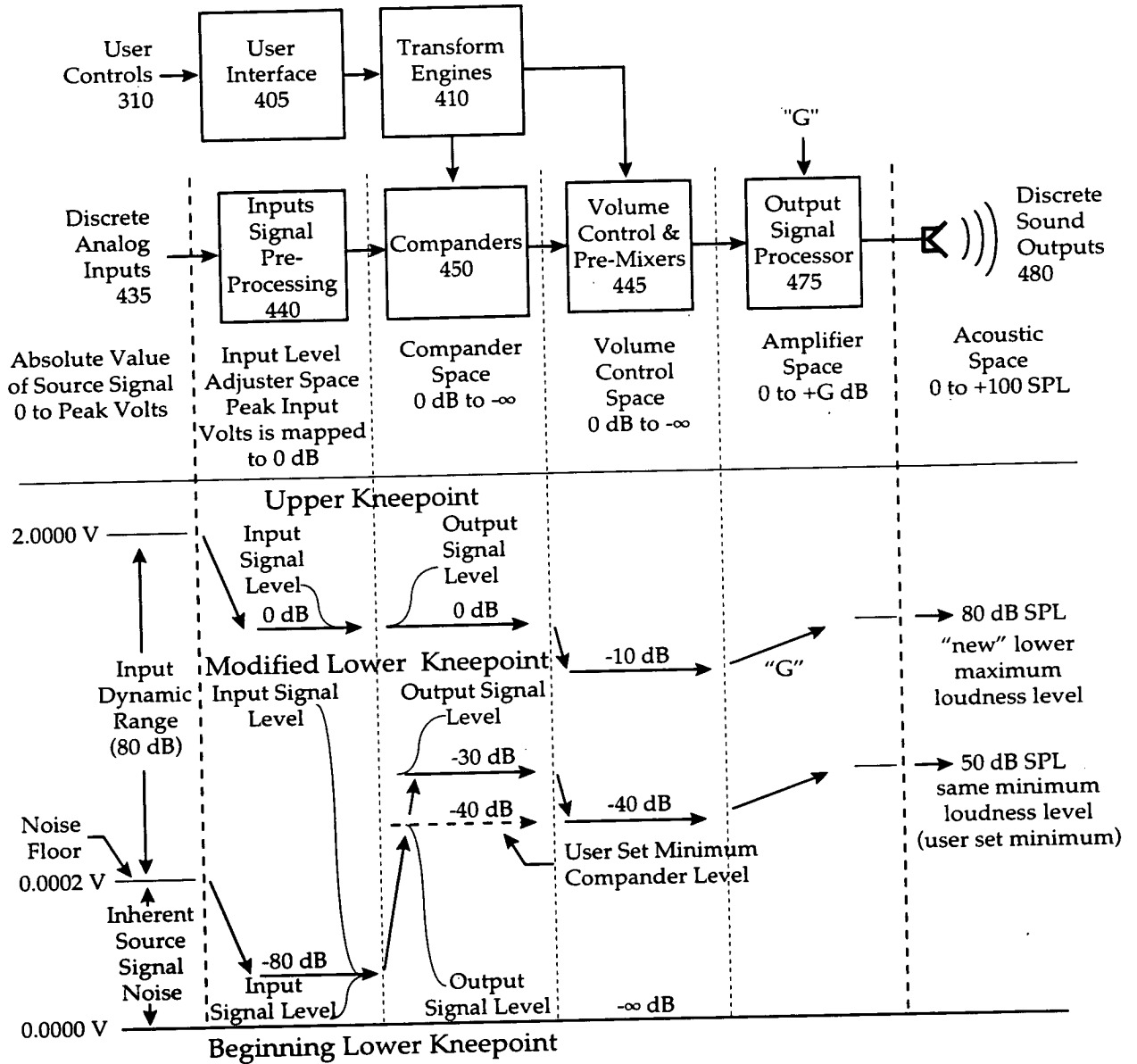


FIG. 66

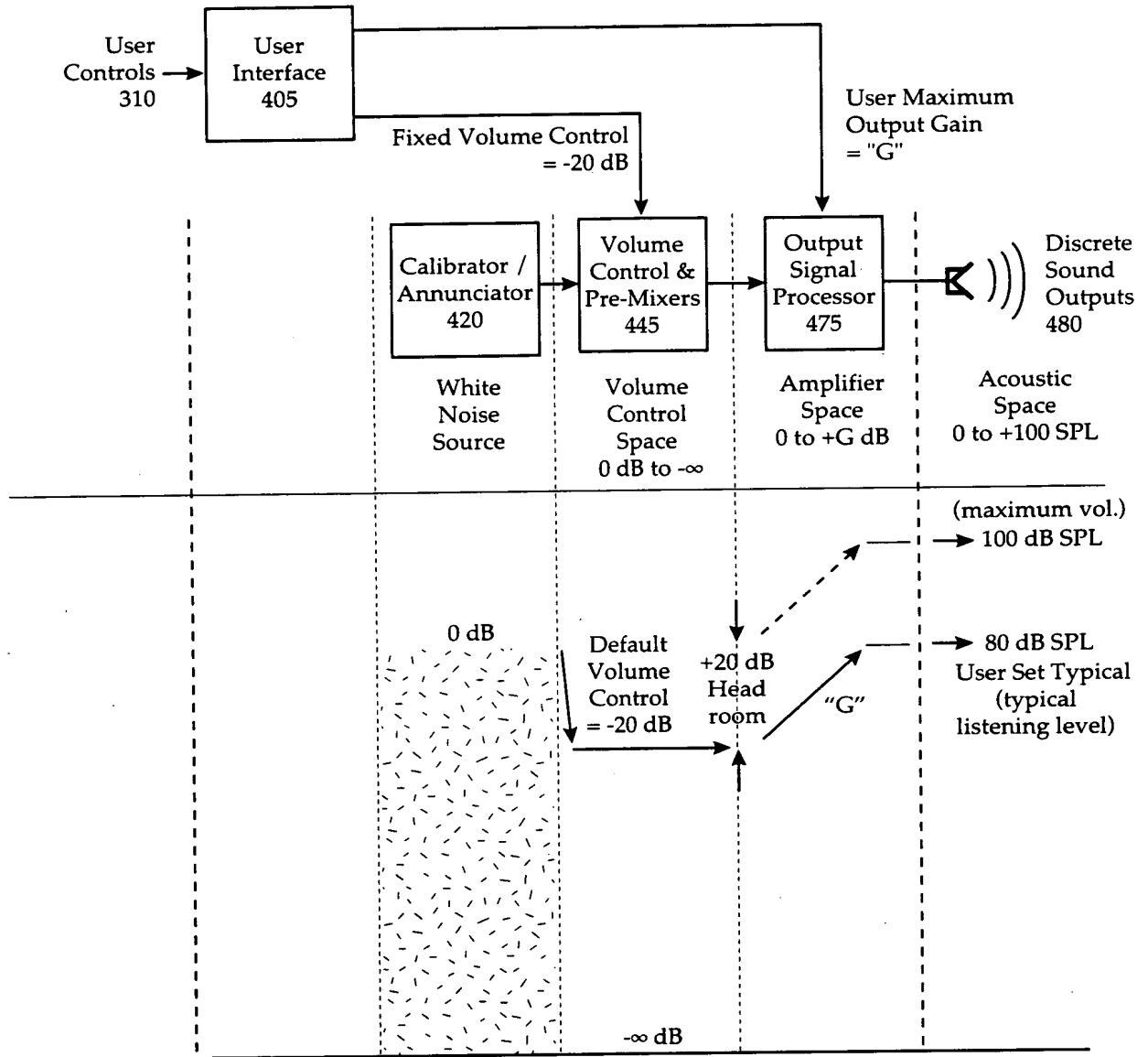


FIG. 67

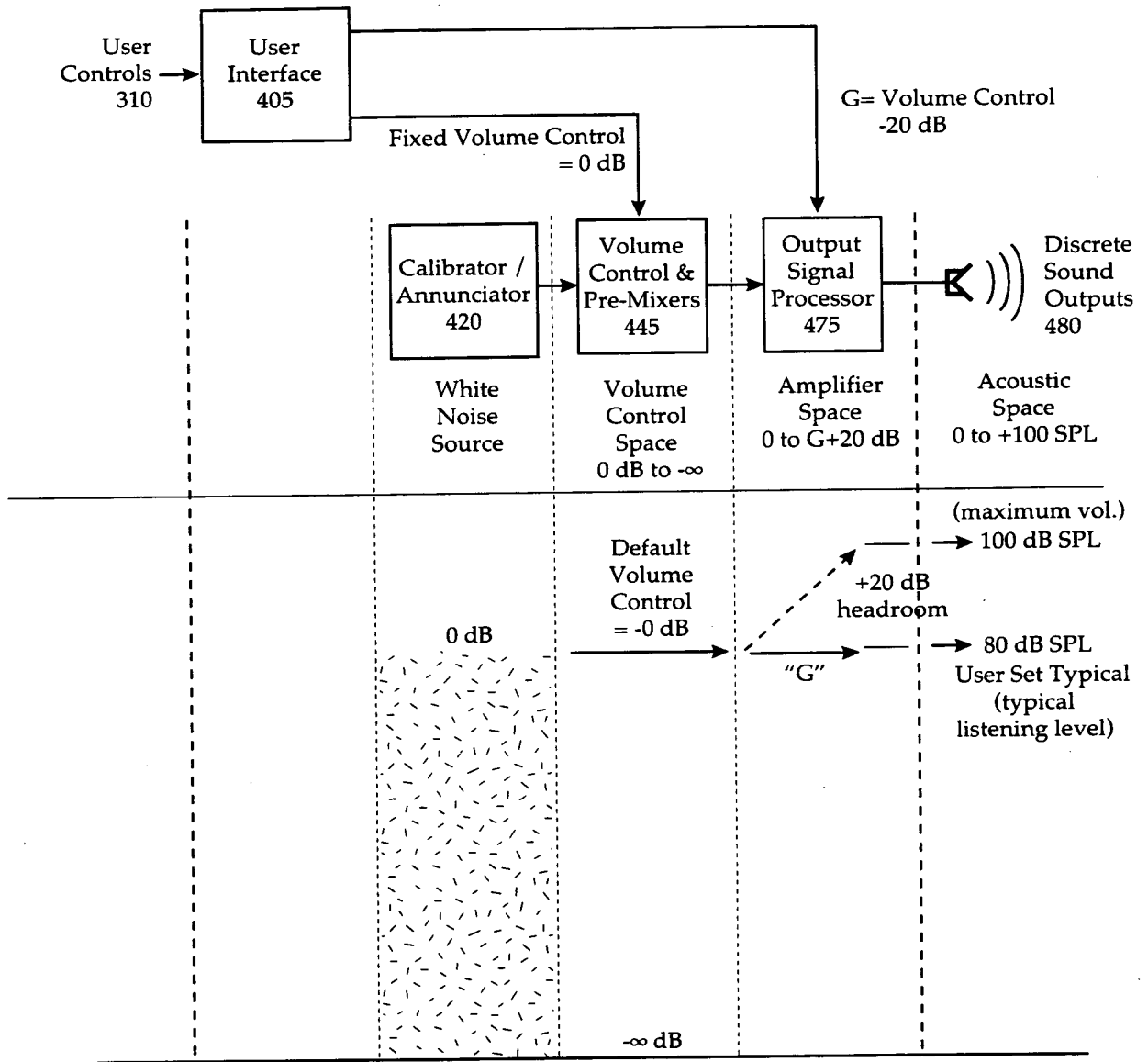


FIG. 68

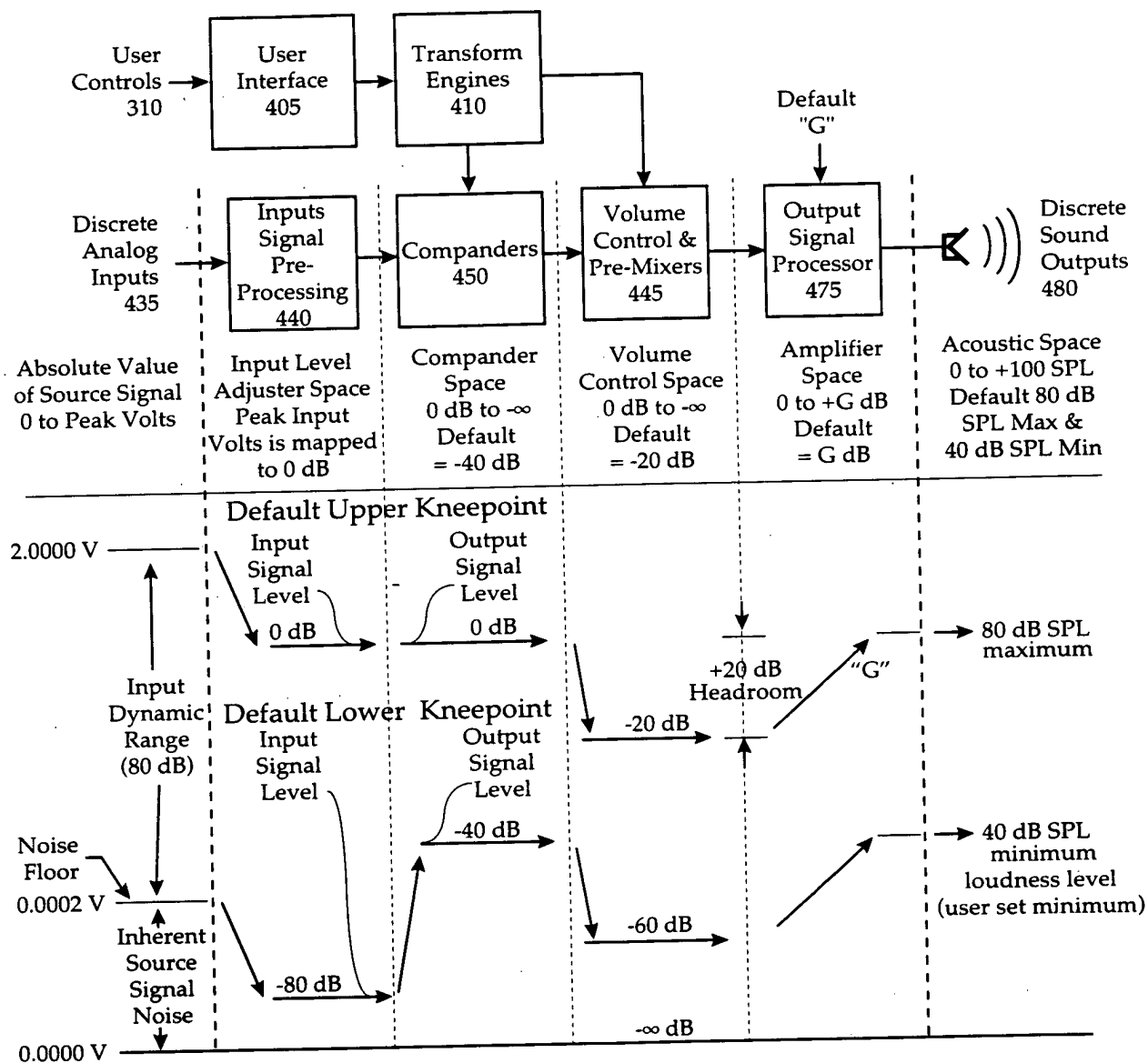


FIG. 69

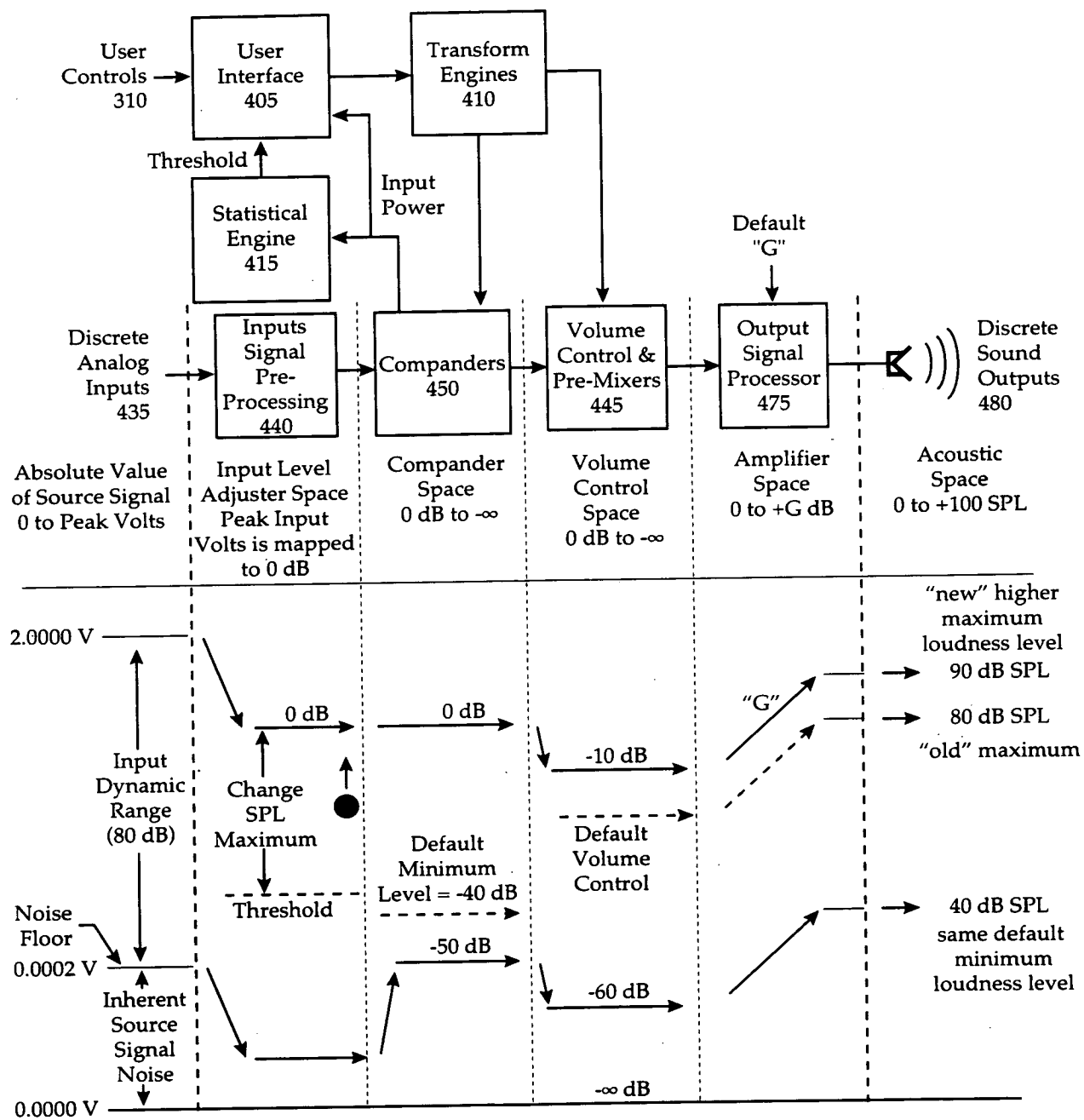


FIG. 70

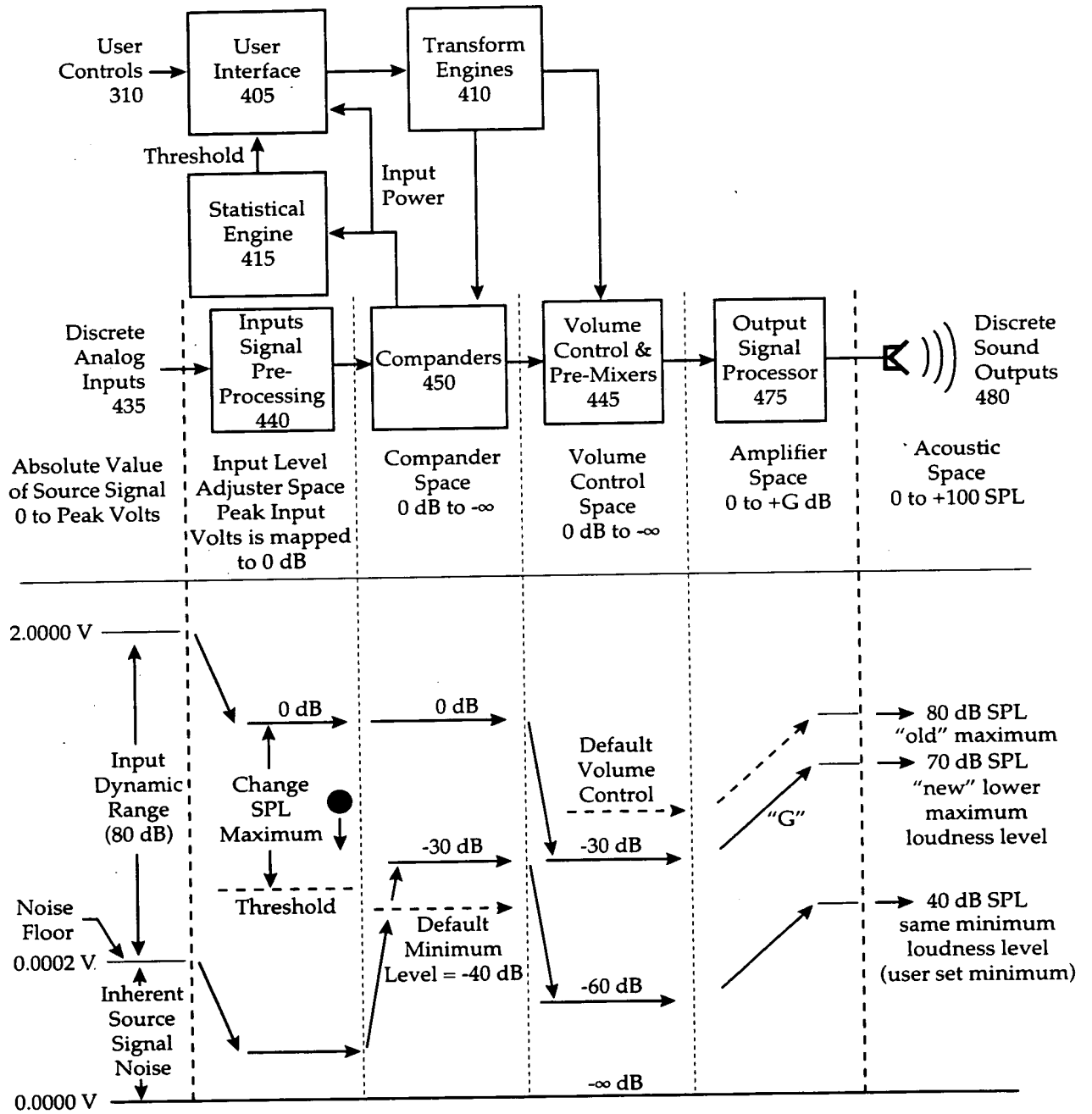


FIG. 71

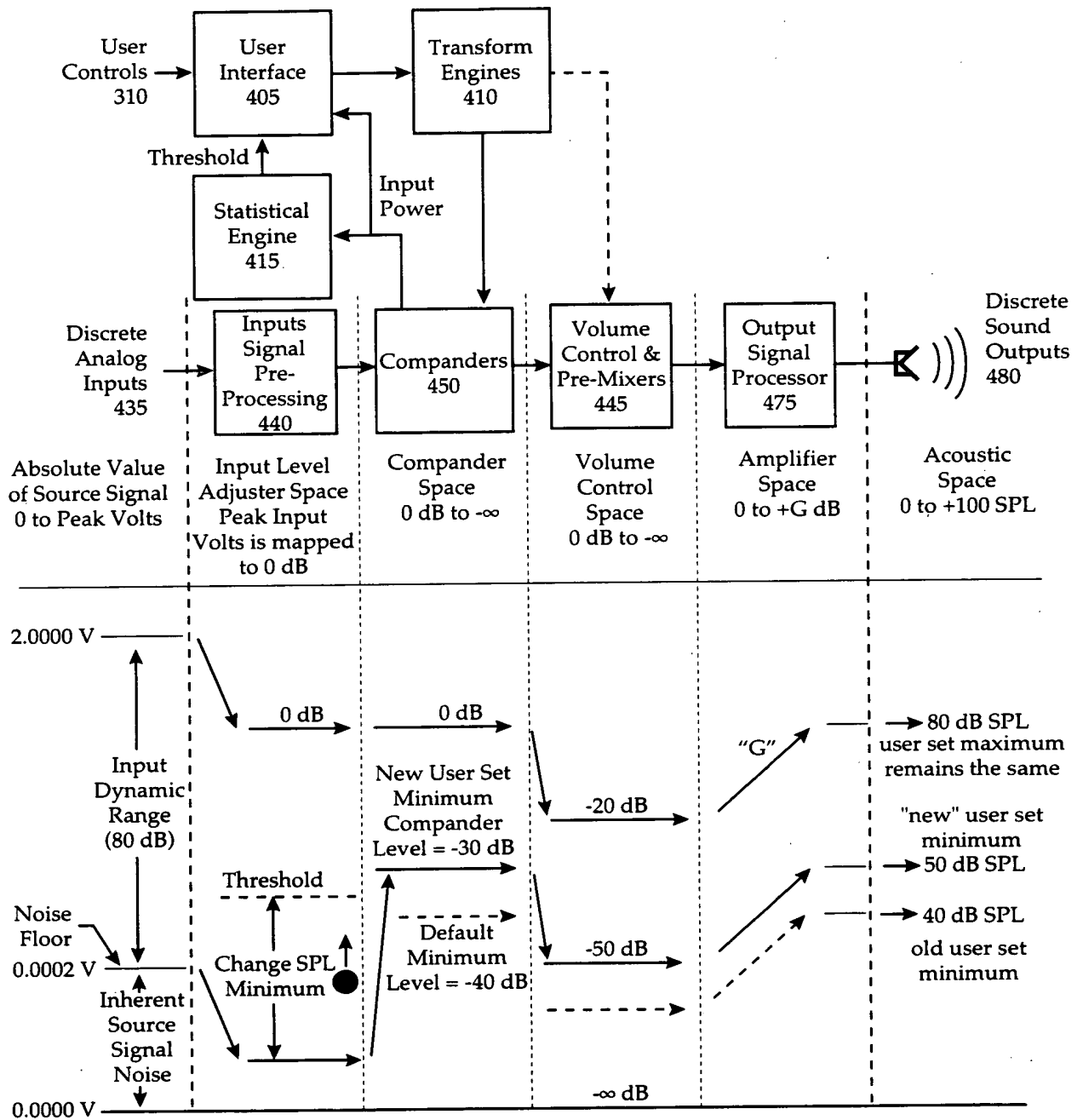


FIG. 72

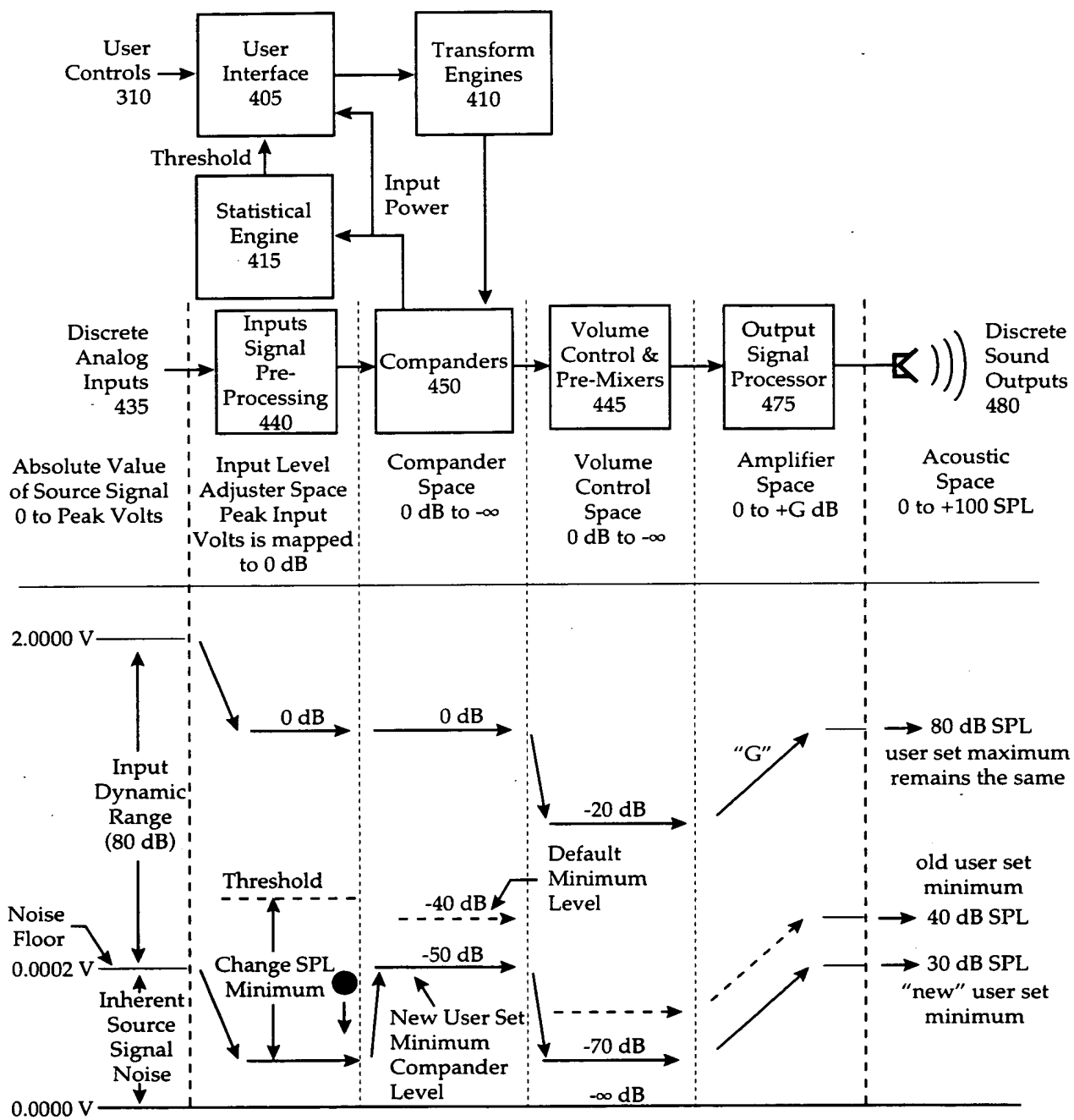


FIG. 73

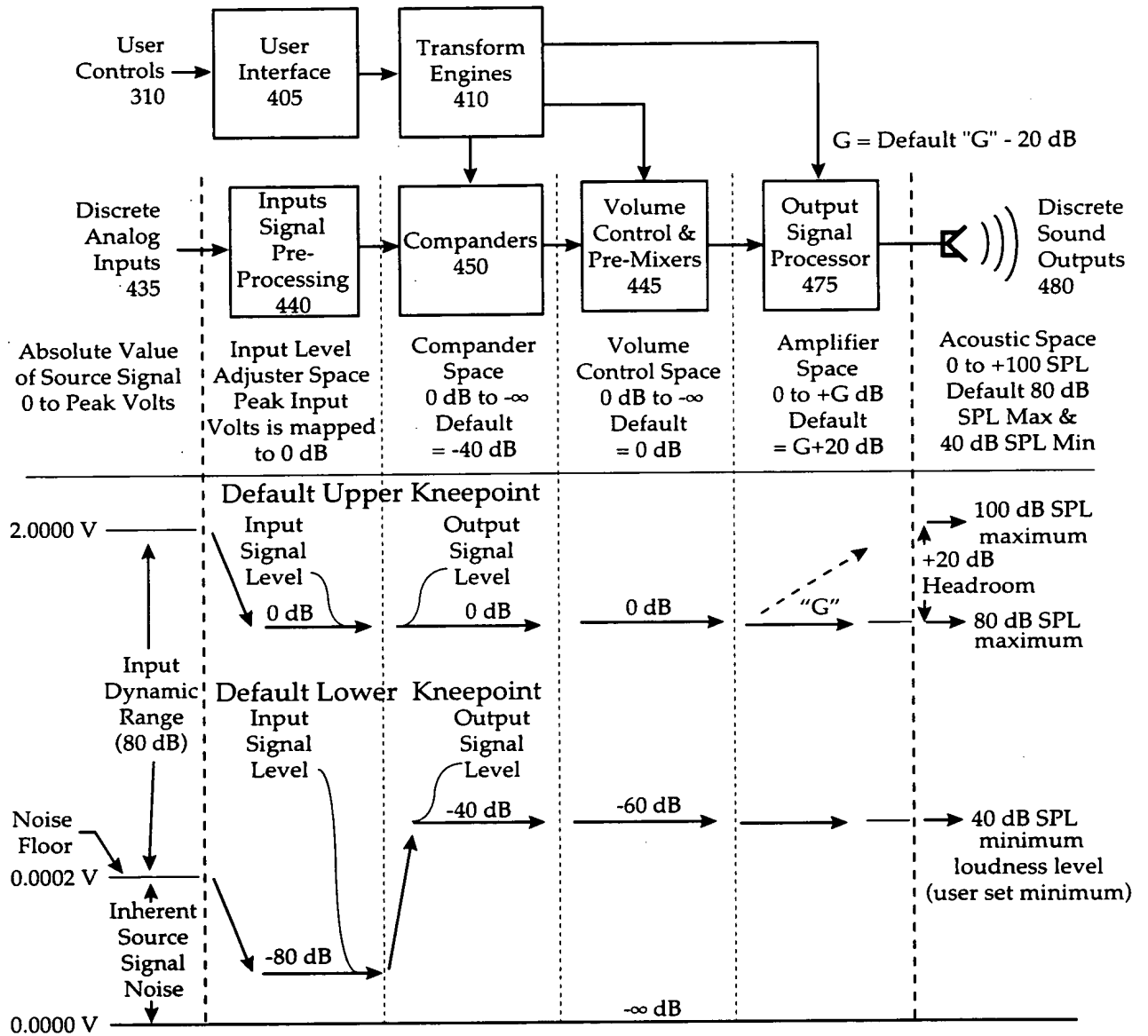


FIG. 74

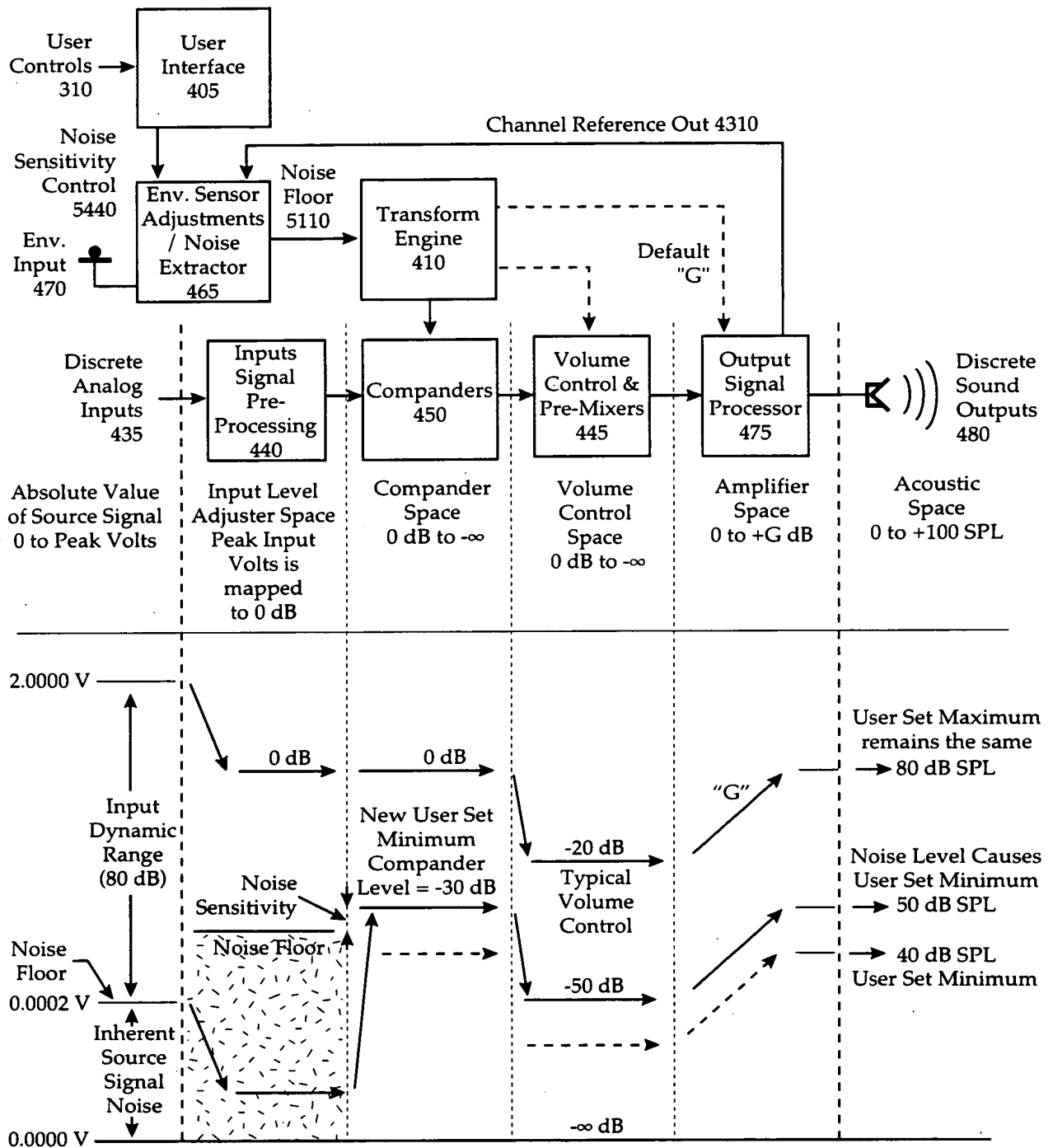


FIG. 75

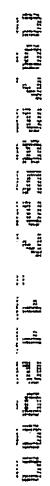


FIG. 76

Setup Command Decoder
and Setup Command Execute
660E and 660F

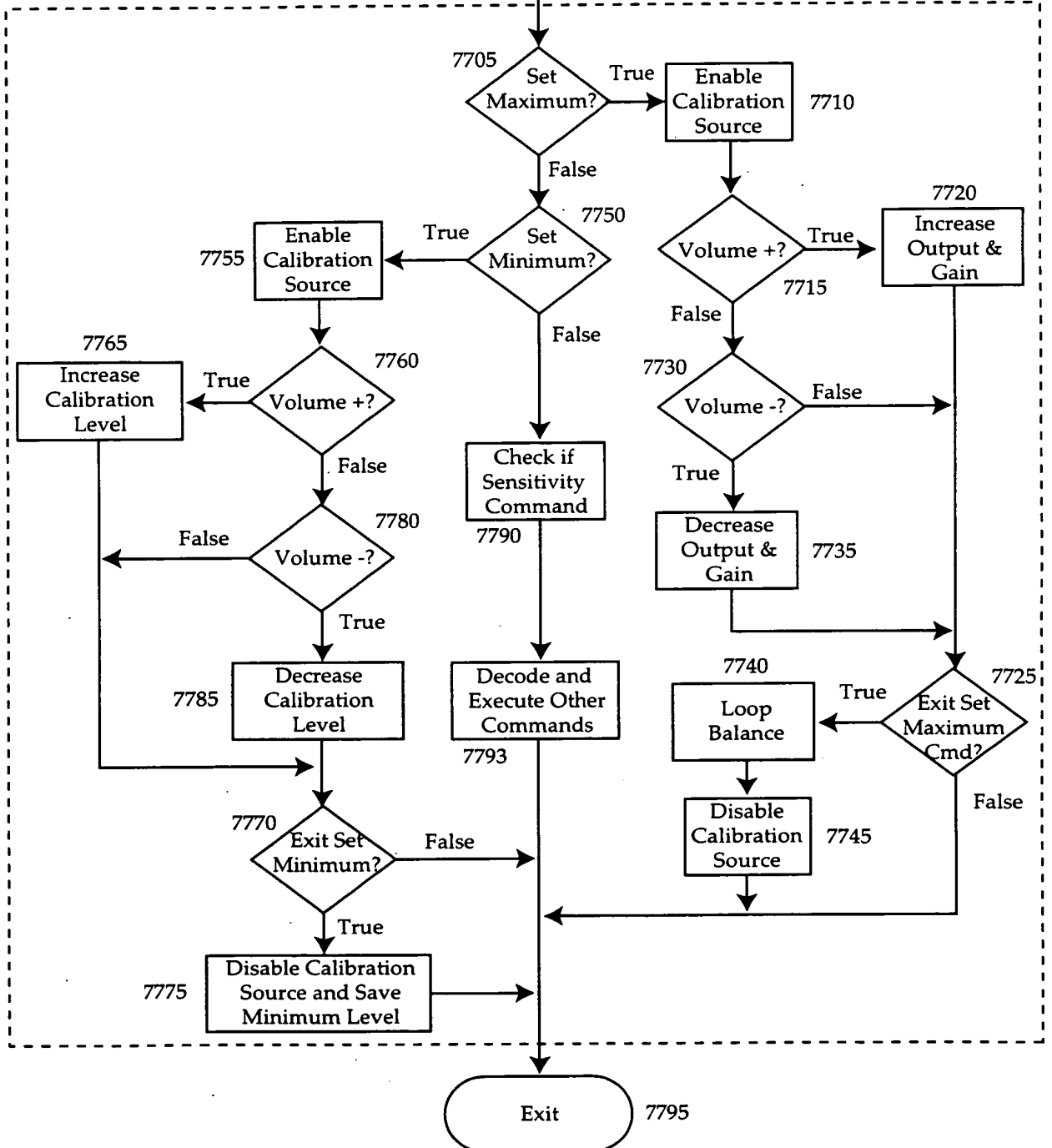


FIG. 77

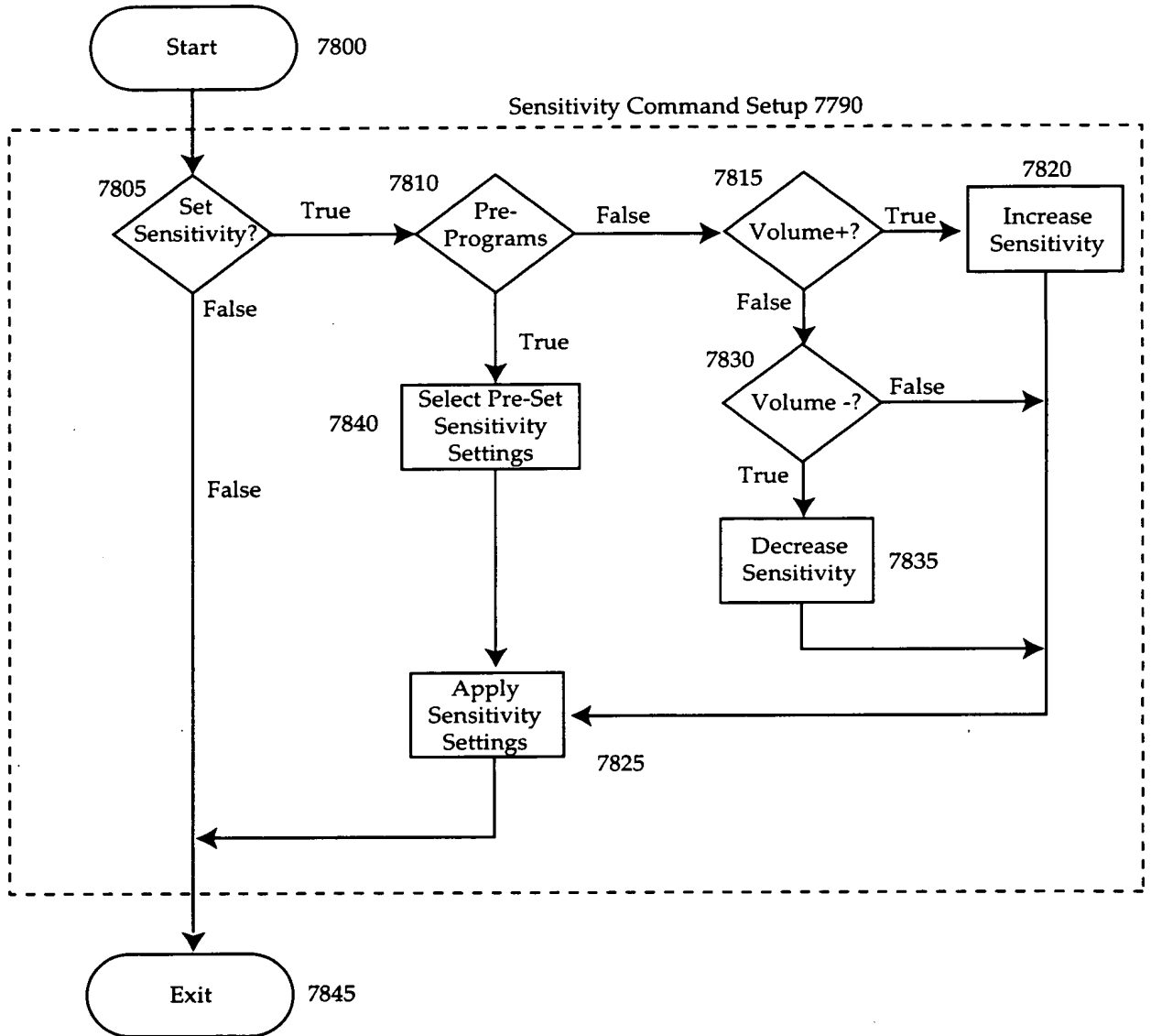


FIG. 78

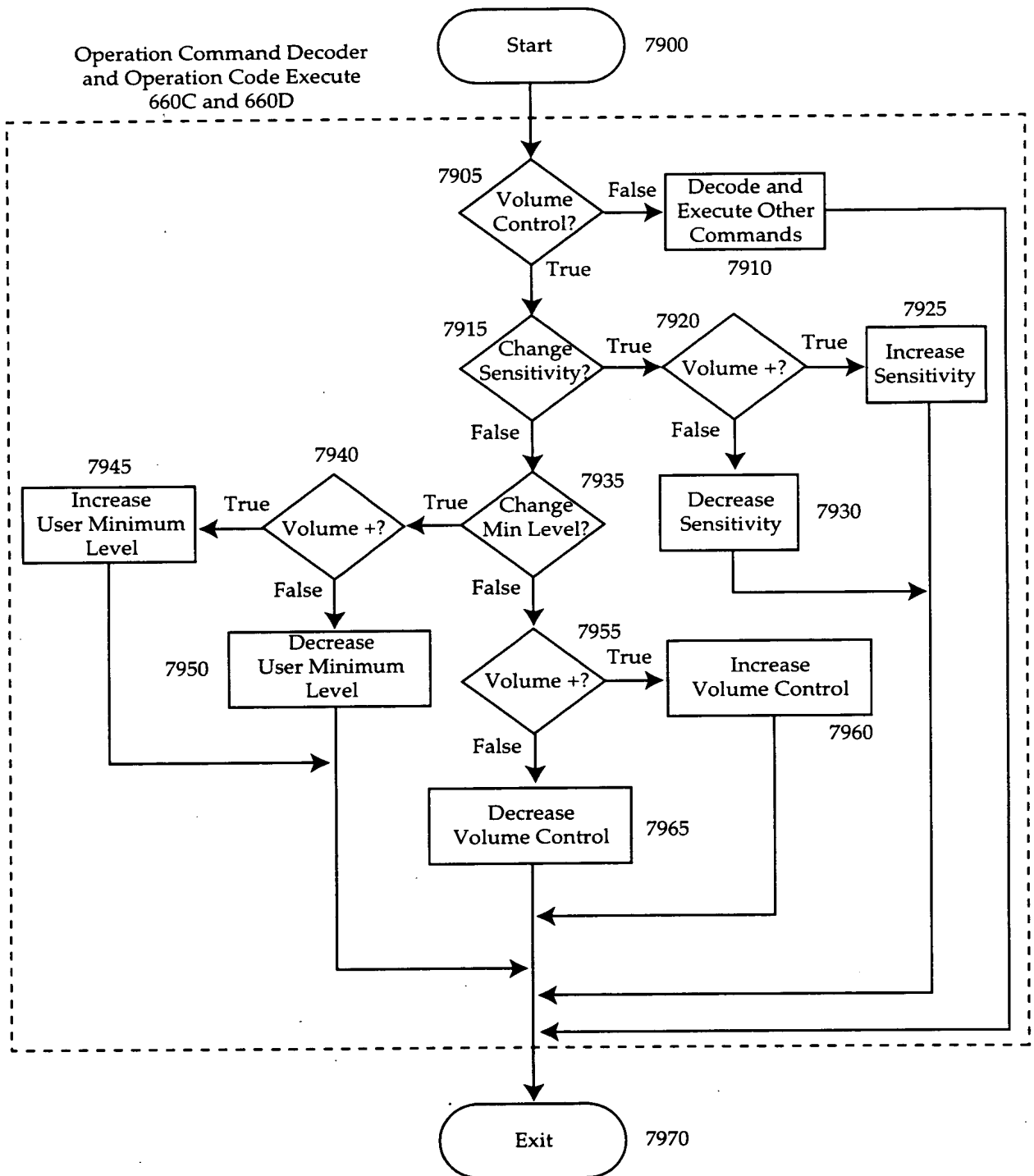
Operation Command Decoder
and Operation Code Execute
660C and 660D

FIG. 79